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AUTHOR Heinicke, Christoph M.; And Others  
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## ABSTRACT

This study investigates relationships between the family environment and maintenance of children's gains from early childhood educational experiences. Participating families received training and counseling from social workers, who focused on improving parent-child relationships. Measures of children's intellectual and social functioning as well as various parent-child interaction ratings were analyzed. Results indicated that intervention with the parents did lead to measurable behavior change in their children. All child indices except peer relations were correlated with changes in some component of parent-child communication, affection, or the extent of parental availability. Discussion focuses on the potential of parent education as a primary strategy of intervention. (DP)

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RELATIONSHIP OPPORTUNITIES IN DAY CARE:

CHANGES IN CHILD AND PARENT FUNCTIONING

by

Christoph M. Heinicke, Ph.D.  
University of California, Los Angeles

and

Larry H. Strassmann, Ph.D., Kayla Hauer, M.S.W., and Esther Strathy, M.S.W.,  
Reiss-Davis Child Study Center

and

Diana Ramsey-Klee, Ph.D.  
R - K Research and System Design

and

Theresa Spingath, M.A.  
Culver City Children's Center

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## ABSTRACT

This study focuses on the impact of extensive social work with parents on the development of their pre-school child. Pre-school children attending two high quality day care centers, Culver City and San Pablo, show a very similar and progressive development during the first six weeks of day care, but only in the Culver City sample was this progressive development sustained during the next 10½ months of being in the program and during their first year of Kindergarten.

The differentiation of these trends first became visible in the 6-week to 5-month interval. It was, furthermore, hypothesized that this differentiation, and more specifically the more extensive progressive growth of many of the Culver City children was a function of changes in their parent-child relationships and the latter in turn was influenced by a social work contact.

To arrive at the conclusion that change in the child is affected by change in the parent-child relationship, a series of analyses were undertaken. The intercorrelation of the various child indices was studied first and is best summarized by the findings on the change scores. Children who are rated as improving in their general adaptation from the 6 week to the 5 month point, also show progressive development in their psychological move from home to center, their peer relations, their modulation of aggression, their Stanford Binet I.Q. score, and their task orientation as measured in a variety of ways.

The study of the intercorrelation of various parent-child ratings is also best summarized by the findings on the intercorrelation of change scores. Those parents who during the 6-week to the 5-month interval changed the most on a global parent to child impact change rating are the same parents who increased both the clarity and time of their availability and the clarity and frequency of their communication with their child. They also tended to increase the active instruction of their child and more frequently move him to new experiences.

Finally interrelating the pattern of change in the child indices and that for the parent-child changes it was found that the changes in all the major child indices except peer relations were correlated with changes in some component of the cluster describing clarity of parent-child communications, parent-child affection and the extent and clarity of the parents' availability. For this sample it would seem that changes in the clarity of the parents' availability were particularly strongly related to changes in the child's development.

The approach to early intervention which has yielded the above findings on how parent-child changes influence child development, stresses that in each set of family-child interrelationships there are certain developmental problems whose solution can be greatly facilitated by working with the parents while at the same time exposing the child to an individualized pre-school curriculum. It is the general hypothesis that changes in family functioning are in the majority of cases needed to sustain the child's developmental progress. The initial evidence contrasting the Culver City and San Pablo population and the analyses within the Culver City population suggests this is the case.



I. STATEMENT OF THE PROBLEM, THE OUTLINE OF OUR APPROACH AND THE DESIGN OF THE STUDY.

A. Statement of the Problem.

A great deal has been stated about the limits and potentials of the child's development in the early years (McV. Hunt, 1961). Less is known about what changes in the environment interact with developments in the child in order to enhance that development and sustain those gains. It has often been found that the initial impact of a program is impressive but that further growth was not seen or the child reverted to the previous rate and quality of development after the program ceased (Karnes, 1969). How to understand this pattern and to avert the decline became for us a critical research problem.

At the time this project was planned, our pilot studies (Heinicke, 1973 a;b) and the research of several other investigators (Klaus and Gray, 1968) indicated that interventions directed toward the family might well be a factor that would both enhance and sustain those changes being encouraged by an individualized pre-school curriculum in a day care center. As such, it represented a return to an emphasis prominent in the child development literature of the 40's and 50's (Sears, Maccoby, and Levin, 1957; Heinicke, 1953) and again revitalized by more recent research (Baumrind, 1970). Different was the fact that the experience of working with parents in a variety of helping situations was now being used to change the "pattern" of parent-child relationships.

Given our interest in the association between pre-school child development and the concurrent nature of the parent-child relationships, the next question became one of how to conceptualize and focus these two sets of variables so that they could be both studied and influenced. Our interest in learning, and particularly the prevention of later learning disturbances, made us concentrate on those pre-school variables that would anticipate variations in the



child's academic achievement in the elementary years.

Review of the existing literature (Heinicke, 1973) and our own pilot research led to a focus on task orientation as a central child developmental variable and then posed the further question of what pattern or profile of parent-child relationship variables was associated with variations in that task orientation.

We reasoned that the assessment of the child's task orientation is not only critical in understanding his readiness to learn and perform, but also serves as a link to various aspects of his development. By task orientation we describe a process whereby the child shows his capacity to engage in, produce in, and take pride and pleasure in a task. To engage in clearly has a motivational connotation; can the child regulate his own behavior so as to be involved and persist. Not attending, actively resisting involvement, and disrupting others are negative behaviors in this regard. Once engaged, what are the indications of pleasure, of producing something, and of pride in that achievement. One way to contrast children is to observe which of these components they are capable of showing in relation to a given task.

Young children can be further contrasted by observing their orientation to tasks which vary in the extent to which they have been structured by an adult. We have so far distinguished:

1. Those tasks which the child himself defines and pursues.

Thus, the task may be to build a secret house of blankets. There is pleasure in the construction and pride when it is successfully completed and used.

2. Those tasks which are defined by making specific materials available to the child, suggesting ways of using this material but leaving the child room for self-structuring. For example,

on the first day of entry into pre-school when three-year-old Judy and Amy were accompanied by their mothers, Judy could become involved in the playdoh offered by the teacher and define it as making cookies for her mother. By contrast, Amy, though showing pride in the paintings that she completed, could not stay with the self-defined painting task and had to attack another child who was also trying to paint (Heinicke, 1973).

3. Those tasks where the goal and the steps to reach that goal are defined by the adult. Thus, the story time defines that the child attend, not disrupt, and contribute in some form to the group effort. Thus, Judy readily seated herself for the book-time, sometimes lost attention, obviously followed the story but sometimes could not answer a question quickly enough. By contrast, Amy delayed joining a story time, disrupted the story by throwing playdoh, and had to be held to avoid further disruptions (Heinicke, 1973). The systematic assessment of the child's task orientations will be described in subsequent chapters of this monograph.

As documented in our review (Heinicke, 1973), the research literature and our pilot studies suggested six hypotheses linking task orientation at the pre-school level to certain other child development assessments. It was found that children whose task orientation is already well developed by about 3 to 4 years of age:

1. Also show at this age more development in making the psychological move from relationships in the family to relationships with adults and peers in the pre-school;

2. Show more development during the 3 to 4 year interval in modulating their aggression; it is neither excessively expressed or repressed;
3. Show at this time a higher performance on I.Q. tests;
4. Show a more developed task orientation at ages 5 through 10;
5. Show a higher performance in tests of reading in the elementary school years, and
6. Show a higher performance in I.Q. tests throughout childhood and in adulthood.

Given this cluster of child variations, it becomes particularly relevant to discuss what pattern or profile of parent-child variables had previously been found to be associated with it. The following hypotheses were suggested and documented in our review (Heinicke, 1973):

1. That in the first three years the child's task orientation and/or instrumental competence is likely to be maximally developed if the main caretaker or defined system of caretakers are affectionate and sensitive to the child's needs, communicate clearly with the child, exercise a moderate level of control and encourage properly paced, stimulating and new experiences.
2. That in the interval from 3 to 10, the child's task orientation and/or instrumental competence continues to be influenced by the caretakers' affection, sensitivity to needs, clear communication, and encouragement of new experiences, but effective

limit setting and explicit achievement pressure also become important qualities.

B. An Outline of our Approach.

One of the initial purposes of the research program to be reported here was to provide further evidence either supporting or negating these hypotheses.

The project was, however, also designed in such a manner, that an effort at influencing this pattern of associations would be attempted. Particular focus was placed on changing the family to child functioning through intensive casework, but our approach to enhancing development is not confined to this variable.

The primary data collection has taken place in two day care centers designed to serve the child of the welfare (A.F.D.C.) and low income family. The two children's centers will here be called the Culver City and the San Pablo day care centers.

Our approach can best be outlined by following the steps taken with a 3 or 4 year old as he or she enters the Culver City day care center:

1. Determine through careful intake procedures whether the child is suitable for the day care center services. Thus, at present severe handicaps like blindness, or the presence of autism leads us to refer the family elsewhere.
2. An effort at gradual entry of the child, while observing him and his parents permits initial formulations of their developmental needs. Contact by the social worker continues and teachers formulate the individualized curriculum needs of the child. By

six weeks after entry all of this information is finalized into a Developmental Plan that serves as a specific guide to the desired goals and the means necessary to attain them.

3. The period from 6 weeks to 5 months begins a period of intensive case work if this is called for by the Developmental Plan. In other instances, infrequent contact is adequate to maintain the development of child and family. At the end of this period, assessments of the impact of this work on family and child are possible.
4. The casework and the individualized curriculum continues in the 5 to 12 months interval. The five month Developmental Plan and weekly staff meetings insure continuing adjustment of both casework and curriculum directions as needed.
5. This approach is maintained from 12 to 24 months even though some of the children may already be in Kindergarten.
6. In a very few cases, where the above total approach has actually led to considerable developmental progress in the child and parents, psychotherapy is nevertheless offered because further progress in the child seems to require it. Most important, the child is seen in a school building next to the day care center.

#### C. The Design of the Study-Evaluation Component.

The nature of the design will become more specific as the data analysis is presented, but an outline will help the reader to orient himself.

There are cross-sectional assessments for the Culver City day care center pre-school children at the Entry Point, after Six Weeks, after Five Months, after Twelve Months, and after Twenty-Four Months. These cross-sectional assessments consist of indices of child development such as task orientation, and parent-child ratings such as affection and liking of mother for her child.

These cross-sectional assessments also permit computation of change scores for both the child indices and the parent-child ratings. Thus, the I.Q. score at 6 weeks can be subtracted from the score at 5 months.

There are process week to week assessments throughout the pre-school years and in some cases the parent-child material continues into the early elementary years. These process assessments consist of a period analysis applied to both child and parent-child material. The qualitative judgments of describing the periods can be analyzed for trend and patterns and the parent-child and child material can be interrelated.

There are also cross-sectional assessments for the matched, geographically distant San Pablo day care center at points corresponding to the assessment points for the Culver City children. These consist of selected indices of child development and parent-child ratings.

There are cross-sectional assessments in December and May for all extended day care Kindergarten and elementary school children attending the two day care centers as well as for the matched controls of the extended day care Culver City group. The main measurement of this assessment consists of sixteen behavioral ratings made by the classroom teachers of the children and the center teachers of those in the Culver City or San Pablo centers.

## II. DESCRIPTION OF THE SETTING AND THE NATURE OF THE FAMILIES INVOLVED.

The Culver City day care center is a year and one half old and is now nearly at its full capacity of 45. It is administered by the Culver City Unified School District and serves the pre-school as well as extended day care population of A.F.D.C. (Aid to Families with Dependent Children) and eligible lower income families. The center and the families served by it are situated in a mixed lower and middle class neighborhood. The situation does not therefore represent the type of concentration of poverty and welfare eligibility seen in certain urban areas. The ethnic composition of the center is predominantly white, with about 10% Spanish surnames and a few black families. This reflects the percentages found in the larger community.

To further specify the above demographic descriptions, the social workers dealing with the Culver City families have made a number of judgments on those who have remained at least five months. These will be elaborated in future reports, but to illustrate, and also to anticipate some of the findings, it was determined that almost all the families received some welfare cash payments when they applied to the center. Two thirds of those families who remained in the center for a year or more no longer required these cash payments. By contrast, only one of the 14 families who had been there less than a year had sufficient financial resources to give up the welfare assistance.

The extent of the burden placed on the single parent mother is underlined by the fact that in only 20 percent of the families did this mother have a fairly stable relation to a man when application to the day care center was made. For families remaining in the center more than a year, in 40 percent of the cases the stability of the relationship to a man improved, but this was only true for 20 percent of the cases where the family had been involved less than a year.



By definition the mothers were either employed, looking for a job, or in job training. In fact, for only 60 percent of the families was the employment and working situation a fairly stable one. During the time of their association with the Culver City day care center, this picture clearly improved. For families remaining for a year or more their job situation; even if it was fairly stable improved in 62 percent of the cases. For families having been in the center less than a year the figure was 35 percent.

As part of the description of the families it was also possible to indicate whether certain obvious signs of depression were or were not present when the families applied for day care. This was seen initially in 71 percent of the cases. Indicating the potential for mobilization, in 69 percent of the cases where the family remained with the center for more than a year, these indications of depression clearly declined. For those remaining less than a year, the percentage of cases of a decline in signs of depression was 50 percent.

What is here called the San Pablo day care center was carefully chosen to be similar in all respects except that the social work service is not as available. What we have defined as the briefer problem oriented service is available but even this is restricted in terms of time. The age of the center, the staffing, the A.F.D.C. welfare population, the size of the center, its location in a predominantly mixed lower and middle class, its ethnic composition, and even the nature of its individualized curriculum are all extremely similar. As will be seen, the development of the children was indeed very similar during the first six weeks of day care.

### III. THE FOUR COMPONENTS OF THE CULVER CITY CHILDREN'S CENTER DEMONSTRATION DAY CARE PROGRAM.

Following certain staff changes and slight revisions, the Culver City day care program for pre-school and extended day care children is now functioning well. A small support group, Friends of the Culver City Day Care Center has been formed to assist in financial and political questions.

Several parent-teacher meetings have also been held and an advisory committee formed. It is hoped that these groups will prove to be instrumental in bringing parents and staff further together in a partnership with the betterment of the children's lives and environments as one objective. Another goal is the sharing of concerns, interests, ideas and support among the parents themselves. As an organization made up of people with a common interest (the children), there are many possibilities for parent education and increased staff understanding.

Since the basic strategy of our approach has already been outlined, in this chapter we will describe in greater detail how we have defined certain components of this approach.

#### A. An Individualized Curriculum

Curriculum is usually thought of as the body of courses offered by an educational institution with specific knowledge to be acquired by the students in a certain prescribed time. This knowledge is acquired and utilized by some, acquired but not utilized by others, and some do not acquire it at all. Rather than setting up a curriculum which presupposes that all children will amass the same specific knowledge being presented by the teacher, we are concerned with the individual learning experience which depends on each child's stage of development. The learning experience comes about when the child interacts with his total environment -- internal as well as external. This

environment includes not only the room and materials such as puzzles, alphabet games, tinker toys and climbing apparatus, but also the choices available to him, the freedom to express himself in an original way, the manner in which he is limited in his activities, if and when the teacher smiles at him and whether he is worried about his mother coming to pick him up on time. The pre-school years are not pre-educational. The way the child learns during these years, the feelings he develops about his ability to succeed, to be competent, to master his environment and his impulses and the techniques he develops to accomplish these tasks have a very significant effect on his future learning ability, accomplishment, attitudes and relationships with people. It follows, therefore, that the teacher needs to be aware of the whole child, his needs, interests, concerns, strengths and weaknesses, and the way in which he can best be approached and attracted to a learning situation. We cannot overestimate the significance of the teacher's goal for providing experiences in which the child can succeed, build his self-esteem, broaden his interests, and increase the number of techniques and alternatives available to him to deal with his world.

It is important to state that not only does the adult/child ratio have an effect on the quality of an individualized curriculum, but the size of the group profoundly influences the value of the program. In order for the teacher to attempt to fulfill the child's needs, organize learning experiences based on his stage of development in all areas, and provide for the vital adult-child interaction which helps him attain a balance between gratification and restriction of impulses and mastery of his environment, the teacher must understand the child as fully as possible. We have limited the size of our groups to 15 children and find that such a maximum allows for genuine teacher understanding and interaction with children. A group environment in which there are too

many stimuli (and people are stimuli) will interfere with the amount and availability of learning possible for each child.

A prescribed, rigidly followed schedule and set environment does not allow for the flexibility necessary to accept each child at his level of development in all areas -- physical, emotional, intellectual and social. An environment of total freedom and unrestricted choices results in a lack of teacher guidance and an unpredictable setting with consequent insecurity limiting the child's ability to master his environment and impulses while hampering future learning. For optimum development the learning experience must provide freedom of a few good choices and freedom of expression within limits.

The skill of the teacher to follow where the child leads and then to offer the kind of direction which will encourage him to broaden his understanding of himself and the world around him, present the most meaningful kind of learning experience to the child. To attain these goals the teacher needs to have a basic understanding of young children's development so that she functions in terms of maintaining reasonable expectations for each child at his respective developmental stage.

In addition to the concern for individual needs, group needs must also be considered with the child relating to and contributing to the group and the group relating to and contributing to the individual.

Since the areas of development cannot be separated from each other, the possible learning experiences in the pre-school setting are almost innumerable. Important consideration is given to the goals teachers have for children in deciding which experiences are vital for promoting good mental health and future learning ability and how these experiences can best be presented to the children. To illustrate briefly, an important goal we have for children which would influence future learning ability is the development of good feelings and

attitudes toward school. It then becomes the teacher's task to see to it that children experience success and enjoyment in school. Another important goal, influencing future relationships with others as well as future learning ability is the development of expression and communication skills. To feel that his attempts at communication are valued and that he, too, is a valued member of his society, the child must know that he is listened to, that his thoughts and feelings are respected, and that the people he relates to want to understand him. In addition, he learns that as he has the right to express himself, others in the group have that right too, and part of the enjoyment of rights for oneself is the ability to grant them to others as well.

Through the vast number of experiences offered the child, the exploration of his world, the sensory experiences, the encouragement of his questioning and curiosity and the guidance provided to offer alternatives to problem-solving techniques, the child accumulates a body of knowledge on which to build future learning. All children do not develop the same kinds nor expanses of knowledge, but each has his own on which to build. In this context we are trying to identify certain skills which will be helpful in future learning. In addition to the communication and listening skills, areas like concept development, color naming, and eye/hand coordination abilities are developed. We anticipate that the definition of curriculum will change as our experience grows and the children's needs change. The following are a few examples of the variety of learning experiences which can be derived from one activity or type of equipment.

Large climbing equipment serves in the development of the large muscles and their coordination. Children become aware of their bodies and what they can do with them. They learn to accept the individuality of their abilities, interests and rate of development, and they begin to understand concepts of size

relationships. Their proficiency in the use of large climbing apparatus may result in feelings of success and self-worth.

Cooking activities provide learning in several areas. Children learn mathematical concepts of measurement. Their vocabulary is increased. They expand the use of their senses with opportunities to taste and smell a variety of foods and to feel the consistency of different foods or the same food in different forms. They learn to work cooperatively toward a common goal. Children gather information about food sources, functions and preparation. Cooking provides experience with real adult work and again may build the child's feelings of competence.

Numerous activities are used to help children develop eye-hand coordination. The various manipulative toys such as tinker toys, small table blocks, lego and many more are extremely useful. Just a few of the art activities requiring the use of small muscles and eye-hand coordination are collaging, sponge painting, eye-dropper painting, sewing and cutting. And again the areas of learning in each of these activities is not limited to small muscle development but includes among other things self-expression, communication skills, development of individual creativity, sensory experiences, an understanding of balance and properties of matter, and mastery of the child's environment. Similarly, teachers can provide many types of materials and activities to develop learning in one curriculum area. Almost everything teachers do can help children develop communication skills. We consider all of the possibilities for language development during the course of the day. Storytime, show and tell time, being characters of a story and acting it out are obvious experiences involving language use. In addition, we help children learn to listen by listening to them, by exploring all kinds of sounds, and by helping them to listen to each other as

well as to the adults. We use every opportunity to help them increase their ability to express themselves. While it is much less time consuming to tie a shoelace when a child thrusts his foot out at you or to get for him what he points at, it is much more important for him to express his need verbally. The use of language at meal times can be greatly enhanced if the social aspect of eating together is emphasized. Exploration of sensory experiences and guidance in expressing them is very valuable. Trips into the neighborhood and to special places offer many opportunities for language development. The possibilities are infinite and require aware and involved teachers who consistently interact with children and creatively consider their goals as teachers.

To define our curriculum in another way, the concept of the day is described below:

CONCEPT OF THE DAY AT CULVER CITY DAY CARE CENTER

- |             |                  |                                                                                                                                                                                                                                                                                                                                                                                            |
|-------------|------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 7:00 - 7:45 | Arrival Time     | - Children are greeted -- an important part of helping each child feel wanted. Children may play with available materials. Since arrival times are varied, there is time for individual communication with a teacher.                                                                                                                                                                      |
| 7:45 - 8:15 | Breakfast        | - Children serve themselves whenever possible and clear their places when finished. In addition to the nutritional value, this is an important social experience as are all meals and snacks.                                                                                                                                                                                              |
| 8:30        | School Time      | - Extended day care children leave for school.                                                                                                                                                                                                                                                                                                                                             |
| 8:15 - 9:30 | Free Choice Time | - Activities are set up by teacher. Cognitively oriented materials are explored. Children may choose from these and other materials available in the room (e.g., blocks, housekeeping corner, paints, manipulative materials, books, other dramatic play, etc.) Children may move freely from one activity to another. Teacher encourages task completion, offers guidance and assistance. |



|               |                             |                                                                                                                                                                                                                                         |
|---------------|-----------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 9:30 - 9:45   | Clean-up Time               | - Everyone helps as children and adults work together.                                                                                                                                                                                  |
| 9:45 - 10:00  | Group Time                  | - Groups may have story time before snack.                                                                                                                                                                                              |
| 10:00 - 10:15 | Snack                       |                                                                                                                                                                                                                                         |
| 10:15 - 11:15 | Outside Time                | - Choices available with all outdoor equipment and special activities and experiences planned by teacher. Opportunities for large muscle development, water, sand and mud play, gardening, dramatic play, etc.                          |
| 11:15 - 11:30 | Clean-up for Lunch          |                                                                                                                                                                                                                                         |
| 11:30 - 11:45 | Group Time                  | - Story, music or discussion structured by teacher.                                                                                                                                                                                     |
| 11:30 - 12:15 | Lunch                       | - Lunch time is staggered for three different age groups as Kindergarteners arrive from school.                                                                                                                                         |
| 12:15 - 1:00  | Outside Time                | - Children play freely. Rooms are prepared for rest time.                                                                                                                                                                               |
| 1:00 - 1:15   | Group Time                  | - Preparation for rest time. Brush teeth, wash faces, toileting, etc. Group time to help settle down.                                                                                                                                   |
| 1:15 - 2:30   | Rest Time                   | - Many children nap. Others rest and/or play quietly on cots. Children are permitted to sleep until they awaken. (Time for teacher to read to or sit with children individually.                                                        |
| 2:00 - 2:30   | Arrival                     | - Extended day care children arrive from school.                                                                                                                                                                                        |
| 2:30 - 3:30   | Group Time and Outside Time | - Waking, dressing, snack. Children go out to play as they are ready. Older children have snack and may have a project, story or play in small nearby park until those resting are outside. Choice of outdoor activities as in morning. |
| 3:30 - 5:00   | Inside or Outside           | - Activities and games set up inside. Opportunity for multi-age relationships and play.                                                                                                                                                 |

|             |                       |                                 |
|-------------|-----------------------|---------------------------------|
| 5:00 - 5:30 | Group Time as desired | Fun Songs, stories, etc.        |
| 5:30 - 6:00 | Clean-up              | Clean-up and goodbyes are said. |

NOTE: Friday morning is usually set aside as a field trip morning and picnic lunch for the pre-school groups. They go to parks, beach, zoo, museums, fire station, etc.

#### B. Relationship Opportunities with Volunteer Teacher Aides

As described in previous reports, volunteer women from the community did initially make a most important contribution to the program. Unfortunately, only one of the four very proficient women remained and she was then hired as a paid teacher aide. We believe one basic difficulty lies in the fact that the volunteers cannot be considered part of the core staff. We feel strongly that there must be sufficient paid staff -- director, teacher, assistant teacher -- to cover the program. The volunteers then, are in a sense a valuable addition.

At present, volunteers are students from Culver City High School enrolled in an Associate Teacher course and students of two local junior colleges enrolled in Child Development courses. In addition, we are most fortunate to have a woman from the community who truly is part of the permanent staff due to her dedication, concern, and involvement in the program. She devotes a minimum of 3½ hours every morning with a pre-school group and interacts with the children on a highly professional level. She attends staff meetings and is studying to increase her knowledge of child development and behavior.

The volunteers function in all areas of the program as teacher aides. Their presence constitutes an important addition to the adult/child ratio. The opportunities for interaction between adult and child are significantly increased. The teacher can be available to more children on an individual basis. Volunteers, as well, provide children with interested listeners and helpers.

In addition to the increased number of people interacting with the children, the volunteers add to the number of adults supervising children and thereby increase the safety of the school situation. It is possible to offer children a wider variety of choices of activities since more adults are present to prepare, set up, supervise, and be involved in the activities.

If, then, the students are of value to the program, the field experience is clearly also of great value to them. Their understanding of child development and child care is greatly enhanced and will prove an important experience for them as an introduction to pre-school education techniques and/or parenting techniques.

The following steps are being established in instituting the teacher-aide program:

1. Students are interviewed by the director. They are assigned to assist with a particular group of children dependent on the center's needs for coverage in the classrooms, teacher needs, individual children's needs, and volunteer's preferences. An important consideration is consistency of adults for the children.

2. Students meet with the director twice monthly for seminars in pre-school teaching techniques. Guidelines for functioning in the classroom and techniques for handling individual children in accordance with their needs are discussed.

3. Assignment of students to a variety of tasks in the classroom is made by the classroom teacher.

4. Readings in child development and techniques of pre-school teaching are suggested.

5. Volunteers will be evaluated. Their strengths and weaknesses will be discussed with them and support for improvement provided.

### C. Casework with the Parents.

The principles we have used in our continued work with parents are derived from casework in general and from psychoanalytically oriented casework in particular. Central to all casework is the importance of the first contacts in building a working relationship responsive to the needs of the client. Since the parents we work with, and they are mostly mothers, do not come to us seeking help, this initial meeting of needs is of even greater importance. Our focus on facilitating the entry of the child into the day care setting by learning about his background, development, and individual habits forms a natural bridge to the further issues confronting the mother. By the time of actual entry, a process is established in which the social worker and mother sit and talk regularly and also observe the child together during his initial visits. The need to communicate and observe called upon in this interaction forms a basis for further work with the parent, a work which says that this is how we can come to understand. In describing the jealous behavior of an older child, for instance, one mother said she simply did not understand it and that perhaps it could never be figured out. Responding that it might not be so hard to understand, the social worker said that there really are reasons for behavior if we work hard to find them. As the process proceeded and the seeming mystery and unrelatedness of events began slowly to diminish for this mother, so too did her sense of helplessness and inability to cope. This was the mother who said in a later interview "I always thought that suffering was my lot in life."

Following the initial contacts and the concomitant assessment of the individual needs of the family, the social worker is available for as long and as frequently as is required to deal with these needs. Regular contacts such as once-a-week interviews are established and maintained until the family and

child are progressing adequately. Telephone contacts and brief conversations with the mothers in the center are typical additions to these interviews.

Our technical conceptualization of the variations in our relating to the parents has been guided by the use of two concepts: The real relationship and the transference. The real relationship refers to those aspects of the interaction that involve the satisfaction of certain current needs or assistance in meeting these needs. Transference refers to those aspects of the interaction in which the client experiences the social worker as if she were an internalized person from present or past relationships.

Initially, the real relationship is in the foreground and it is characterized by support and assistance. Used as a source of active help during the intake period, the social worker is experienced directly as a flexible, generous, and available adult. She is soon asked for advice and suggestions in a number of concrete areas. The atmosphere in one family home was dominated by a disabling injury to the father in an automobile accident. As husband, father and breadwinner, this man's past history had been characterized by vigor, endurance, and physical strength and his self-esteem had rested heavily upon the values of autonomy and self-support. Early contacts with the social worker revealed the parents' struggle to retain their independence in the face of their misfortune and their inability to express their need for help directly for fear of weakness. After much difficulty, they were able to verbalize their frustration with the welfare department and to ask the social worker to help them find a way of obtaining food stamps. When the social worker actually accompanied the mother to the agency, a critical turning point in the relationship was achieved.

Environmental services seldom stand alone. The social worker was

able to gain deeper understanding of the meaning of dependency for this family. For the clients, the social worker's support had a profound and personal meaning. Eventually, work on the transference aspects of this problem came into play. This family had in the past dealt with longings to be cared for by being fiercely independent. Their self-esteem and sense of superiority to "poor trash" had been confirmed by their ability to give to and make things for others. Awareness of the underlying feelings toward the helping person was crucial although not initially interpreted. Instead, the family was encouraged to give in other ways to the center.

For families such as these, the real relationship components predominate with the use of transference phenomena being secondary. The work in the real relationship may range from assistance in utilizing community resources, such as food stamps, to help in applications for employment, to referring a child to a guidance clinic. The character of the client contacts is such that transference phenomena intrude upon the helping process in a minimal way.

For other clients, the transference is definitely operative in the relationship and must be understood if the relationship is to continue. Only gradually, however, may it be subject to interpretation. This is partly due to the fact that the weekly contact, if it is that frequent, neither permits the clarity of transference reaction nor the opportunity for assimilation of the interpretation of that transference as exists with more frequent contacts. Other considerations pertain, however. Given the tenuous ego functioning of certain of the parents, interpretation may be contraindicated, at least initially, because it would not be understood, would then seem unresponsive, and might actually increase the level of anxiety.

Interpretation was initially contraindicated for a psychotic mother,

and supportive strategies in her case consisted of helping her to differentiate between what was real and what was fantasy, between what was inside and what was outside. This is a mother who ended a weekly session with the social worker by commenting, "You're a kind of transition between my formal, stuffy psychiatrist and the real world. You help me get through the day." Although the focus of the work was upon the "bread and butter" issues of everyday living rather than upon intra-psychic insight, it was crucial for the social worker to understand the transference issues as they revealed themselves in this client's communication.

Constant crises beset the work with this mother. If she was overwhelmed and unable to cope, the social worker helped her to organize her life in its minutest details. The social worker had to constantly devise active means of reaching out to and maintaining contact with this fragile client and of providing the psychological nurturance that would help her to cope. Interpretations were initially limited to the recognition of certain patterns of reactions and behavior and their effects on others rather than their dynamics. But this seemed not enough as the client's frequent and repetitious descriptions of a lonely and angry world brought her little relief and threatened to disrupt even her tenuous ability to function. This client's view of an ungiving world was eventually focused upon the social worker who became the object of an intense transference reaction. It was the social worker who did not care about her, who would not let her quit her burdensome job, and, especially, it was the social worker who talked to other mothers and preferred them over her, just as her own mother had preferred a younger brother. Repeated demonstrations of concern did little to lessen these displacements, and it was not until interpretation was made, albeit cautiously, that a significant reduction in anxiety could begin to occur.



For yet other parents, transference reactions predominated from the first and interpretation was not only effective but necessary to sustain the relationship. In these relationships, the real relationship components remained present, but they did not form the essential focus of the work. One mother's chic appearance and excellent job performance were but superficial defenses for more primitive feelings of unworthiness and deprivation. As she began to trust the social worker with these, it became clear that her difficulty in feeling and expressing affection for her child was related to her own restrictive ties to her past and to her hostile-dependent relationship to her own mother. This mother approached all relationships with the pre-conscious expectation that expression would lead to arguments that could be resolved only by her being asked to "move out of the house." This had happened to her with her own mother during adolescence. As she began to experience an emotional connection with the social worker, her sudden wish to terminate emerged. This could be understood as a passive to active defense which was part of a generalized transference resistance. Protecting herself from anticipated rejection, she had habitually terminated relationships before they were established and had thus denied herself the opportunity for the closeness she said she craved. When focused upon her behavior in the treatment, the interpretation of the resistance and the underlying transference made the continuity of the relationship possible. Slowly the client's feelings of helplessness and inability to affect her world began to yield to gains in insight as she was permitted to experience her expectation of loss in relation to the social worker. Interpreting the client's current feelings and behavior in terms of past experiences, the social worker was able to help her understand the manner in which she misconstrued the present in terms of the past and ultimately to help her move toward a greater sense of mastery

and independence. As feelings of self-assurance began to replace the self-perception of inadequacy, this mother became freer to try out healthier modes of relating to her child and to have more confidence in and derive more pleasure from her role as a parent.

Generic casework issues assume a special configuration in a day care setting and give rise to technical considerations unique to that setting. As in all social work, we had recognized the significance of beginning well and of moving from the point of entry to a broader base of understanding the family. If the "good safe place" we were offering the child initiated the casework relationship and the supportive availability of the social worker sustained it in its early days, these very factors, nevertheless, gave rise to special dangers and a special challenge in our work.

For one thing, the "good safe place" was a school, a place for education, where the work of teaching was the major order of the day and the work of teachers its important vehicle. Could our work with parents, we asked ourselves, be so designed as to enhance this central function, to help create, through interaction and communication, a unified approach to our children and families? As clinicians could we formulate our knowledge in such a way, and share it in such a manner, as to facilitate its practice in this field of education? In weekly meetings with the teaching staff we came to recognize that for them the crucial test of our effectiveness would be the classroom. Could we, for example, "do something with that mother" so that a particular child could take a nap? Didn't another mother recognize, for instance, how her constant late arrivals in the mornings harmed her child's participation and disrupted plans for all the children? "Does your work work?" was an implicit question as the teachers began to express the sources of their own frustrations and to describe demands from children who could not be still, whose hyperactivity interfered with learning.

whose lack of speech gave little access to communication, whose low tolerance for limits presented constant interruptions. The luxury of casework, with its careful respect for pace and timing, gave little comfort in time of stress to teacher-caretakers who often needed to act at once.

The lack of synchronization between the casework and the teaching systems may emerge in yet another way. What happens, for example, when the work with the mother has indeed advanced to the point in which she can assist her child in some developmental task, only to find that the social worker may not have prepared the teacher sufficiently to respond positively to the child's new move? One child had stopped attending, and the teacher felt her sudden absence as a "pall cast upon the group." Why was this child missing, the teacher wanted to know, in a demand that seemed to say, "Why have you let it happen?" The social worker was quick to act, and careful work with the mother resulted in the child's eventual return. But the social worker had not informed the teacher of these plans, and the child's return was greeted with an apathetic nod. The failure to plan together on the part of the social worker and teacher had now been displaced onto the child.

The day care setting poses yet other challenges to social work. If, as our experience indicates, the supportive nature of our early work with parents moves us quickly to intensified relationships in which transference reactions are manifest, how can this be understood within our setting, where the social worker is very real? If transference is enhanced, as we know it is, by the incognito nature of the therapist, how can it develop when the real relationship plays such an essential role in the beginning? It could well be that the transference manifestations are indeed never as fully recreated in our setting, but it is our observation that it is this initial gratification itself that may

actually throw the presence of these phenomena into greater relief.

The social worker's availability as a permanent member of the staff, as a person seen outside of the privacy of the therapeutic hour when parents bring and pick up their children, as a person seen in the home, and her actual caretaking in the early work with entry intensify, we believe, the longing for the mother in the real relationship and the regressive longing for the "good enough" mother in the transference relationship. It soon became obvious to the mothers that this social worker saw others and in certain cases this led to intense jealousy and acting-out in the center and elsewhere. Mere gratification was then not enough and a shift in the focus of the relationship had to occur. One mother's constant need to change the interview hour expressed her intense jealousy of the other mothers whom she often saw when she came into the center. If she was expected during the noon hour, she would appear after work and ask to be seen. If she was scheduled to come later in the day, she would suddenly appear at noon. For her the social worker's involvement with another mother was but one more confirmation of the rejection she anticipated as a result of her own developmental experiences with her own mother. "Do you ever work on weekends?" she once asked, despite her own availability during the week. During one session, she related that she had "just dropped in" to see the social worker but had not been able to wait her turn because she had another appointment. She soon found herself waiting again for that appointment. Just as she was called in for it, she turned around and walked out. By turning the tables she had acted out her anger at the social worker. Another mother responded with something less than pleasure when her sister applied for day care and with great relief when she learned this sister was not eligible. This was later recognized as a displacement from her childhood home in which the sisters battled jealously

for even the small store of parental affection that was perceived to be available. Extreme vigilance characterized this mother's conduct in the Center as she assured herself that she and her children received their proper share of attention and concern. It was not until these feelings were interpreted within the transference that she began to experience the anxiety of these needs and to understand her current feelings in terms of past experiences.

The relationship with one mother soon moved to the point where she was able to bring out considerable material relating to her promiscuity. This was a mother who characteristically ended the casework hour by thanking the social worker for all her help. After one such session, however, she approached a teacher and expressed fear that she had offended the social worker by her language. "I really respect Mrs. \_\_\_\_\_," she asserted. In a subsequent session, the social worker's interpretation of the client's expectations of disapproval and its relationship to her past experiences as a disapproved <sup>of</sup> adolescent led to the recall of how sexually stimulating and attractive her father had been to her during her growing-up years. The social worker had become her disapproving mother.

Another challenge arises from the fact that the social worker may be pacing herself carefully in terms of the relationship, and, in particular, interpretations around resistance, only to find that the actual problems of the child may so intrude that this careful timing, for the moment at least, is lost. Even the most cautious respect for the necessary defenses of one mother who described her <sup>Son</sup> ~~son~~ as a "model child" had to yield one day to the child's temper tantrum enacted before the mother and social worker's eyes. This mother was not yet ready to discuss the difficult behavior her child exhibited daily at the center or to tolerate the anxiety involved in understanding how her own over-indulgence of and inability to limit this child was related to her anger in her

own childhood situation with a narcissistic, selfish mother who made demands but could not protect her. "I want you to tell me if something is wrong," this mother early advised the social worker but she then proceeded to attribute the cause for all of her child's disruptive behavior to the uncaring staff of the elementary school <sup>he</sup> ~~she~~ was attending.

Experience during the first year of operation has demonstrated the need for considerable flexibility in the definition of the social worker's role. Casework treatment of the parents from the point of intake through the establishment and conduct of long-term therapeutic relationships must be responsive to the central task of providing day care services within a group setting. In order to broaden the scope and applicability of our work with parents, we are now including and experimenting with a brief or short-term type of intervention. The initiation of a brief intervention is very similar to the process involved in the on-going treatment in order to provide a basis for assessment. Each approach begins after a series of interviews held during the intake and early period of adjustment to the center, interviews which help us evaluate the functioning of mother and child. For the child we use developmental criteria: To what extent is the child moving forward rather than being fixated. This is elaborated in later sections of this monograph. For the mother we ask: "How does she relate to her child, to her family, to her boyfriends, to her job; how does she relate to the center staff and especially to the social worker?" Both types of intervention -- on-going or short-term -- emerge, either from a request from the parent because of her perception of a need for help or are initiated by the social worker because of problems perceived by those working in the center. This second basis includes concerns involving problems in a child's adjustment, in parent-child interaction, or in a parent's own life which might be adversely affecting either of these other areas. Another factor common to both types of

intervention is the importance of the first contacts in establishing a working relationship that responds to the need of the parent as a person as well as a parent. The relationship established at the beginning is one to which the mother can return for specific, problem-oriented help in the future, and our early findings would indicate that this initial relationship both enables the mother to request the help and also greatly contributed to the effectiveness of the time-limited approach.

A brief illustration involves Mrs. L. who, two months after entering her 3 year old son, asked for an appointment to discuss severe problems with her 13 year old stepson. The situation became critical to her before the in-person interview could take place several days later, so a lengthy telephone interview was used to help her clarify the problem, her options, and the feelings which were interfering with her ability to make a decision. She was able to reach a solution which, for the time, was both practical and reasonably comfortable. A few weeks later, when it became necessary to revise the solution and she became aware of the effect this problem was having on her functioning in several areas, she again asked for help. A series of interviews was set up to focus specifically on helping her to return to her accustomed high level of functioning. This involved further exploration of her relationship with her stepson (complicated by the fact that she was now divorced from his father) and the understanding of how the feelings from that situation had now affected her adjustment with her own children, her job, and her overall sense of confidence and self-worth. There seemed no doubt that the use she made of the telephone interview when she felt herself in crisis, and the subsequent short term problem oriented therapy had a firm basis in the relationship established during the intake and early period in the center. Needless to say, this also aided the social worker in quickly determining when and how to focus and interpret most effectively.



An important task as we continue to expand our experience and understanding will be the development of criteria for the selection of cases for brief or on-going treatment. Decisions about suitability, efficiency and optimum response will be linked to evaluations of the nature of the problem, the level of disturbance of either mother or child, and the purpose for the intervention.

D. Training Opportunities at the Center.

In addition to the training provided to the volunteers, fellows in child psychology and psychiatry have through their contribution also had an intensive training experience. Three of the fellows from the Reiss-Davis Child Study Center have observed the children, and two of them from U.C.L.A. are doing child therapy as part of the approach outlined above. All fellows receive supervision and attend the weekly staff conference.

E. The Integration of the Total Program.

The careful and continuing integration of the total demonstration program is a primary and essential goal. Integration of effort starts with the recognition of the autonomy of various functions. The day care service is, in a certain sense operated without the additional help of the child development and social work staff. The Director is responsible to and receives administrative support from an assistant superintendent in the Culver City school district.

The senior author is responsible for the child development and social work staff, meets weekly with the Director of the day care center and acts as liaison with the assistant school superintendent if necessary.

Total center and research staff meets every week to discuss those children and their families that are of interest. Priority is given to the

concerns of the teachers, but the occasion of the assessment of the child may serve as the starting point for a discussion. Everyone contributes so that a full picture emerges and generally there is consensus on what further steps to take. Understanding the situation is initially encouraged but there is also a consistent emphasis to move this understanding to the definition of practical steps.

#### IV. PROCEDURES FOR DATA COLLECTION: THE PROCESS DATA.

Certain data are gathered sufficiently often enough to capture process changes: The social work contacts with the parents, and the observations of the pre-school children in the classroom.

##### A. The Data from Social Work Contacts.

In about 50 percent of the families seen, an appointed once-a-week contact has been established. In all other cases there is an average of a once a month contact. Home visits are made as part of these contacts, with the frequency varying according to the needs and characteristics of the family. However, each home is visited in each instance to correspond to the designated cross-sectional assessments.

Immediately following the contact the social worker dictates a process recording of it in descriptive as opposed to inferential terms. When interpretations are made, they are kept separate from the description.

These appointed contacts are supplemented by the frequent informal contacts between parents, social workers, and teacher as the children are brought to and picked up from the center.

##### B. The Data from the Observers of the Children.

The four teachers and four child development professionals, who are also trained as child psychotherapists, contribute on a regular and scheduled basis to the total data pool. This results in almost daily observation on practically all of the children.

The teachers have been asked to write out whatever they feel to be of importance on a particular day. We wanted as much as possible to have observations from their point of view because certain aspects of behavior come to

light that can only be seen by what is essentially a participant observer.

However, this approach means that from a sampling point of view coverage may be uneven, so this was dealt with by carefully instructing and scheduling what will from now on be called the child observer.

Each child that enters the day care center is given primary observation time by each observer on each observation occasion during the first 5 months and at the 12 and 24 months assessment point. By primary observation time we mean that the child is followed individually for at least about 10 minutes during each day's observation period. The general procedure is to observe for about 10 minutes per child and then to go to a separate room to dictate the observations into a dictating machine. Because time is insufficient for all observers to view all children every week, a secondary priority of observation is given to those children having passed the 5 month point. These children are observed in the usual 10 minute manner once a week by one of the observers and as part of group situations involving a primary child seen by any of the observers; also, to the extent that any teacher or observer has extra time to watch them, additional observations may be made.

Three of the observers observe three hours a week and one devotes 10 hours to this task. The important point is that they contribute approximately the same number of observations per child to the data pool every week.

The primary guide to the observation of the child is to focus on the description of those behaviors that reflect his developmental progress and allow inferences about his inner experience. These inferences, if made at the time of dictation, are separated from the descriptive text. For example:

Paula moved into the nursery school classroom tentatively, with her finger between her teeth. Although she was initially cautious, she soon seemed

quite confident to be there, did not cling to her mother, and her facial expressions relaxed. Carefully, she fed or cleaned various dolls. At times she would go over to her mother to receive very quiet and warm affection, and then move away from her again in order to resume her play in the doll corner. Throughout this first period there was, however, little noticeable contact with the teacher or student teachers.

It would seem that engagement in the activities of the school was initially dependent on the affectionate reassurance from a physically present mother. The longing, associated anxiety, and the disruption of her engagement became even more pronounced as the mother actually began leaving (Heinicke et al, 1973b).

The time of the observations is, of course, carefully recorded.

Following the profile conceptualization of Anna Freud (1965) we have asked observers to keep the following areas of functioning in mind:

1. Approach to Each Nursery-School Day. In view of our interest in the child's psychological move from the home to nursery school, his initial adaptation at the beginning of each day was thought to be particularly revealing. We asked ourselves to what extent the child became involved in new relationships and new activities, and what modes of alternate adaptation he pursued if his engagement did not increase during the morning.

2. Relationships. The child's relationships to the various people in his life were noted with great care. Influenced particularly by Anna Freud's developmental line concept of moving from dependency to self-reliance (1965), we asked how changes in past relationships and formation of new ones tended either

to represent the continuation of the past or tended toward greater self-reliance and adaptive exchange.

3. Expression of Affects. While many affects, such as sadness, cheerfulness, hate, and love, would most easily be studied as part of the observations of the child's relationships, we also followed the child's development in expressing affects independently of those relationships.

4. Anxiety. Anxiety was also most frequently observed in the context of relationships. Those anxieties relating to separation, messing, and the expression of aggression were especially noted. Wherever possible, observations and inferences were also made about related present and past conflicts. In general we were, however, cautious about inferring underlying dynamics.

5. Defenses and Modes of Coping. Defenses seen in the nursery school included such things as turning a passively experienced event into an actively manipulated one, a great variety of defensive identifications, and various forms of avoidance of painful situations.

6. Ego Development. This included what Anna Freud (1965) has conceptualized in her Developmental Profile as ego functions, as well as those considerations involved in her concept of lines of development. Ego functions include attentiveness, frustration tolerance, memory, and reality testing. Many of these functions and their effective integration were best studied in relation to certain tasks and special assessment procedures which are discussed in subsequent sections. Observations on such lines of development as reliability in bladder and bowel control and the attitude toward food could readily be made in the everyday nursery setting. Similarly, the learning of certain skills such as tricycle riding or holding a pencil proved to be sensitive reflections of ego

development. We also noted any indications of the child's identification with persons in the environment.

7. Superego and Superego Representations. In this regard we observed any indications of guilt or shame, the cognitive elaboration associated with such affects (superego representations), and the underlying conflicts which possibly are associated with such phenomena.

8. Self-Representations and Ideal Self-Representations. We were interested in how the child sees himself and whether or not this representation is fairly accurate or distorted. Sometimes one observed the child's enactment of what he might want to be.

9. Fantasy. While we have been cautious in inferring fantasies from the child's overt behavior, there were instances when the operation of an underlying fantasy could be inferred with considerable confidence.

Of the various foci noted above, the child's relationship to the observer needs elaboration. The observers do not initiate or even encourage interaction with the child. When the child becomes too involved with the observer, steps are taken to shift the relationship to the teacher. Despite this stance, the children do react to the observers and the nature of this reaction becomes one of the most sensitive indices of the child's development. Thus, one little girl first turned to the observer asking for her mother, later actively avoided the observer, and then both rejected and invited him.

The experience of observation inevitably influences further observation. Certain questions have served as guidelines for both the observations and the ratings made at certain cross-sectional points (See next section).

1. What is the nature of the child's move from the relationship with the parent or caretaker who brings him, to the activities, adults and peers in the Center?
2. What is the nature of his relationship to adults and to his peers?
3. What is the nature of his task orientation?
4. What is the nature of the expression of his aggression? Is it either excessively expressed, excessively repressed or well modulated?

In the area of the child's task orientation, a number of additional procedures have been developed. In each classroom on each observation occasion, the teacher reads a book or asks the children to participate in a structured activity, such as naming colors. The observer now sits on the fringe of the group and scores the behavior of each child. The scores rather than the description of behavior is written on a pad. The time is carefully noted. It is assumed that when a child is looking directly at the teacher and is listening, he is attending. We do not actually score this but score the other behaviors. The following categories are now used:

1. Disengagement:

- Inattention -- looks away, dreaming
- Resists Involvement -- actively refuses to participate

2. Engagement:

- Shows spontaneous interest



Asks questions

Attention is automatically tabulated later, every 30 seconds, if no other category was noted.

3. Seeking Affection and Attention:

Seeks attention

Seeks affection

4. Disruption:

Disrupts or interrupts and this is so perceived by teacher or peer

Aggresses against another person

5. Production:

Gives a Correct Answer

Gives an Incorrect Answer

Makes a Good Contribution without being asked

6. Seeking Lap:

Child sits in lap part of all of the time

7. Regression:

Sucks thumb

Whines, etc.

V. PROCEDURES FOR DATA COLLECTION: THE CROSS-SECTIONAL DATA.

For purposes of group comparison, analysis of individual variations, and trend analyses, certain selected cross-sectional assessments are made at entry into the day care center, and at 6 weeks, 5 months, 12, and 24 months after entry. Figure 1 is the data collection form used to indicate when each procedure is due for a given child.

A. Psychological Testing.

The Stanford Binet is administered by an experienced psychologist at each of the cross-sectional points. Most importantly, this professional does not have any other information on the child or family. To provide additional information on verbal and performance subtests, the WPSSI is administered by another experienced psychologist when the child is ready to enter Kindergarten.

B. Video Taping the Task Orientation and Other Behavior.

Each child is video taped at each of the cross-sectional assessment points. Both a broad free sample of the child's behavior and his or her specific task orientation behavior in the book time is preserved on video tape. The latter is scored using the same scoring system used on the spot by the observer of that book time.

C. Task Orientation Scores.

The availability of continuous task orientation scoring makes it possible to generate cross-sectional scores for each child on each of the dimensions of task orientation (e.g., disruption).

D. The Child Development Ratings.

Related to the central questions previously mentioned, five developmental ratings are made at the 6 week, 5, 12, and 24 months point. It is

important to stress that while, for example, the 6 week rating focuses on the status of the child at that point, the nature of his development in the interval before that point is carefully studied. The title of ratings is given below; they are defined in Appendix A.

1. The nature of the child's psychological move from the parents to a new involvement in school.
2. The nature of the child's peer relations.
3. The nature of the child's task orientation.
4. The nature of the child's modulation of aggression.
5. The nature of the child's general adaptation.

E. The Parent-Child Ratings.

The parent-child ratings are also made at the 6 week, 5, 12, and 24 month points. For those children in the extended day care program (including nursery school siblings and nursery "graduates"), parent-child ratings equivalent to a December and May point also are available. The purpose is to match them in time with the ratings made on the children by their teachers. (See below for further description.)

As with the child development rating, the parent-child rating focuses on the cross-sectional point in question, but the time span before it is carefully studied. These ratings reflect those qualities in the relationship which previous studies had found to be associated with the child's development and in particular the development of his task orientation. The titles of the ratings are given below; they are defined in Appendix B.

1. The quality and quantity of the parent's affection for and liking for his child.
2. The extent of time and energy that the parent has available for his child.
3. The parent's capacity to maintain an organized and effective environmental sequence.
4. The clarity with which the parent defines his availability.
5. The extent and consistency of the limits set by the parent.
6. The standards set and the sanctions used by the parents in regard to (a) aggression control; (b) cleanliness; (c) self-reliance; (d) adult role behavior; and (e) achievement in preacademic areas.
7. The extent of clarity in parent-child communication.
8. The extent of the parent's active instruction.
9. The manner and extent to which the parent encourages the child to move toward new experiences and relationships.
10. The frequency with which the parent is involved in a conceptual exchange with the child.

Although change scores could be computed by finding the difference between a parent-child rating at two different points, changes in the parents' functioning both as persons and as parents were specifically noted through the use of two global change ratings. Employing a rating ranging from -7 to +7,

each rater was asked to indicate the extent to which the parent had changed as a person and as a parent. For the rating of the person this was in all instances the mother. All relevant aspects of her functioning were considered. Comparison with other mothers in similar circumstances was made.

In making the change ratings on the parents, not only the mother but all significant parenting figures were considered. What was the extent of change in the total parenting situation? Both the specific parent-child ratings defined previously and changes seen in other parents were used as reference points. It should be noted that these change ratings cannot be begun until the 5 months assessment; at 6 weeks there is no previous systematic assessment.

#### F. The Doll Play Interview.

The purpose of the doll play interview is to provide a private opportunity for the child to express, and a trained child therapist to assess his predominant preconscious concern. A standard set of toys consists of the following: A doll house with a family of dolls (Heinicke and Westheimer, 1965), a family of large hand puppets, a variety of rubber animals, packets of soldiers, Indians and cowboys, a variety of cars and airplanes, two large dolls, one of which could be bottle-fed, a Playdoh factory set, and crayons and paper.

The session lasts for about 40 minutes and is tape-recorded mainly to get a sample of the child's speech and to provide the opportunity for further analysis at a later time. If the child asks about the machine which is visible, the purpose is explained and the child is told that he may hear his voice if he wants to. No problems have been encountered in this regard.

Almost all children quickly express themselves in relation to the adult and the material. The major concerns or questions that the child is dealing with can be readily inferred. For an example, see the case of Bobby C.

Partly to provide some structure for ending the play interview and also because the procedures have been found to predict later reading achievement (de Hirsch, et al, 1966), the following is attempted towards the end of the time. The child is asked to tell any story that he can think of. If he cannot think of anything, he is asked whether he remembers the story of Goldilocks and the Three Bears, Little Red Riding Hood, or The Three Little Pigs. Then the child is asked to draw any picture he likes. If he doesn't draw something spontaneously, he is encouraged to draw a picture of any kind of person and then a boy and a girl. Finally, he is asked to write his first and last name, and to spell it if he cannot do the writing. Immediately after the session, the interviewer dictates a full process account of the session as well as his interpretation of the behavior, related environmental information, and hypotheses regarding underlying dynamic elements.

G. Teacher Ratings During the Kindergarten and Elementary School Period.

While the major focus of this project was on the children's functioning within the context of the day care center per se, a logical extension would include an assessment of their public school experience. In this context then, it was decided that a rating scale would be developed which could be used by the grade school teachers to indicate the nature of the child's behavior and performance in the areas we thought most clearly reflected significant aspects of his development.

In order to provide as direct an extension of the day care pre-school assessments as possible, the ratings constructed for the public school were basically an elaboration and refinement of the areas tapped by the child development ratings (See page 39 ). As can be seen by comparing both sets of items in

Appendices A and C, the various school ratings could be grouped under the five child development ratings.

Thus, the first item relating to the child's move into his respective setting is essentially equivalent for the two scales while the second through fifth items of the school ratings are variations of the child development rating pertaining to the nature of the child's peer relations. School ratings six and seven are elaborations of the rating relating to task orientation and both sets of ratings have a comparable question regarding the child's manner of dealing with his aggression. Then, in addition to the foregoing, the school scales include items tapping obedience and affect state. Both scales also include an overall rating and in analyzing the school ratings a "total" category was also established.

In addition to having the Culver City day care center children rated by their public school teachers, two contrast groups were assessed in an equivalent manner. One group consisted of the San Pablo day care center children who had gone on to public school while the other was composed of other welfare children in Culver City matched on age, sex, grade, and class (where possible).

During December and the following May, the public school teachers of the various children rated them using the School Rating Scales and the children in the two day care centers were also rated at the same time by their respective center teachers.

In viewing results based on these ratings, it is necessary to emphasize the small size of our initial samples. Additional samples are being collected and will be used to test the initial hypotheses. Thus, there were only four Culver City day care center kindergarteners who completed the school year and six additional siblings. San Pablo had six kindergarteners and no siblings, while the Culver City control group was reduced from 10 to 8 over the course of the

school year. Furthermore, although our information regarding the San Pablo group suggests its comparability with the Culver City sample, we have no way of gauging the nature of the after school care that the Culver City controls were experiencing (i.e., were they with family, baby-sitter, or private day care?) Issues of invasion of privacy precluded our getting in touch with this group.

It is also highly significant that personnel changes at the Culver City center and in certain public school classes meant that the June ratings were not always made by the same person who did the December ones. While this was only the case for two public school teachers (out of 22), both center raters had changed by June so that it is difficult to gauge the impact of these factors.



## VI. PROCEDURES FOR DATA ANALYSIS: THE PROCESS DATA.

### A. The Period Analysis Leading to the Developmental Plan.

The period analysis is a procedure for dividing a given time span (e.g., from 6 weeks to 5 months) into a number of phases which describe changes in the parent-child relationship or the child functioning in that interval.

The first step is to read all the material from the contacts with the parents and other caretakers. Notes are taken on each interview or contact and general phases of adaptation, progression or regression are delineated in terms of the dates involved.

A similar procedure is then followed for the children, except that the very extensive observations permit study of the changes in each function. Thus, as the material is read, notes are made in relation to each area, such as relationships, on each day (See Figure 2 for example). Upon completion of the note taking in relation to each of the areas of functioning, these are studied to determine where a major change occurs; (e.g., crying for the mother in the morning may drop out). The notes are so arranged that one can then see between which days changes occur in several areas. If these changes in effect represent a quantitative and/or qualitative change, this is designated as the end of one phase and the beginning of another.

The content of the periods for the observations on the parent contacts and those on the children are then given in summary form and statements are made concerning the interconnection between parent, parent-child relationship, and child changes. This leads easily then to the formulation of further goals and the means for achieving them and is contained in the concluding sections of the developmental plan. After the intensive study of the material for the period analysis, it is relatively easy to focus on the end of the interval and make the

cross-sectional parent-child , and child development ratings.

The reliability of the period analysis. The period analysis on children has previously been checked for reliability (Heinicke and Westheimer, 1965). Further checks are provided in the sample to be analyzed in this monograph in that 15 of the children are analyzed by one observer and 10 by another.

A further check of reliability is in process. Two child psychoanalysts also trained in child development research are reading all of the observations and viewing the video tape on four of the cases. They will judge which of several qualitative statements best describes the parent's progress, the child's development, and the interconnection between them. These statements will have been derived from the period analyses completed by the observers on all the cases. They will then be asked to write a detailed statement giving the reasons for their choice.

#### B. The Task Orientation Categorizations.

These direct categorizations derived from weekly observations are converted to ratios indicating the frequency of a given category per number of minutes the child is observed, for example, the number of disruptions per minutes of observations. Groupings can then be made which best highlight the trends in the individual task orientation categories.

Reliability of the task orientation scores. Not only are these scores contributed to by three different observers, but a more direct reliability analysis is being made comparing the scores derived on the spot by the observer and those scores derived from the video tape of the same session.

## VII. PROCEDURES FOR DATA ANALYSIS: THE CROSS-SECTIONAL DATA.

### A. Psychological Testing.

The scoring of both the Stanford Binet and WPSSI follow standard procedures, but the reports themselves are written in greater detail and reflect the extensive child clinical experience of the two diagnosticians.

Reliability of the psychological testing. In so far as the I.Q. scores correlate with related measures such as task orientation, their reliability is enhanced. This is especially the case since the examiner has no other information on the children.

A more direct reliability test was possible by comparing the Binet I.Q. scores with the WPSSI scores derived by another examiner on the same children at approximately the same time. The total Binet score correlates with the total WPSSI to the extent of .63;  $P < .01$ . The N is 14 and we anticipate with a larger N and greater range the correlation will be higher.

### B. The Task Orientation Scores.

The computation and reliability of these scores as frequency per minute ratios has already been described in relation to the process analysis. A certain set of observations then will best represent the cross-sectional assessment.

### C. The Child Development Ratings.

These developmental ratings need no further data analysis other than that which is done to derive various intercorrelations.

Reliability of child development ratings. The fact that eight (8) different observers contribute to the data pool minimizes the possibility of subjective bias. Moreover, the fact that 15 cases are rated by one observer and 10

by another removes the objection that the results could be generated by one person. Since four of the cases will also be rated on these ratings by two outside data analysts, a further reliability check is provided.

D. The Parent-Child Ratings.

These parent-child ratings also need no further data analysis other than that which is done to derive various intercorrelations.

Reliability of parent-child ratings. All parent-child ratings are made by the social worker involved with that family as well as by the observer doing the period analysis, child ratings and developmental plan on that family. Table 1 gives the intercorrelations of the two sets of ratings on the Culver City Sample after 6 weeks and 5 months of day care. Ratings VIa, VIb, VIc and VIc have poor reliability and IX improved after clearer definition. Findings based on VIa, VIb, VIc and VIc must therefore be viewed with caution.

Another check on the reliability of these ratings will be provided by the two outside data analysts who will rate four of these families at each of the assessment points.

E. The Doll Play Interview.

In further processing the data from the doll play interview, we will first of all follow the procedures suggested by de Hirsch et al (1966).

In telling the story, how many different words are used? Does the story have a beginning, development, and end?

In judging the pictures, modified procedures used for the Draw A Person test will be applied.

In regard to the child writing his or her name which of the following applies:

1. Cannot name either name
2. Can name one name
3. Can name two names
4. Can spell part of one name
5. Can spell part of two names
6. Can write part of one name
7. Can write one name
8. Can write one name and part of another
9. Can write two names.

In order to be able to compare assessments, the observer who has done the doll play will be asked to state the child's main concerns in one or more sets of statements, e.g., the child's main concern is that a rival for his mother's love is going to get him and his second major concern is that he doesn't quite know where he is going to live next.

Reliability of procedures from doll play. The outside data analysts will be able to infer from the doll play record what they think the child's main concern is.

Similarly a research assistant will be asked to make the judgments both on the stories told and the names written or spelled by listening to the recorded tapes of the session. A word count of the different words used in the total session is not only of interest in its own right but can serve as a reliability check on the number of different words used in the stories.

F. Teacher Ratings During the Kindergarten and Elementary School Period.

These ratings need no further data analysis other than that which is done to derive various correlations.

Reliability of public school ratings. Direct tests of the

reliability of these ratings such as having different teachers in the same room rate the child are not presently available, however they are being planned for. Also, since the school ratings are very similar to the child development ratings made in the day care centers, there is reason to anticipate some of the same levels of reliability.

Comparison of the ratings made by the public school teacher and the day care center teacher who sees the child after school was made but raises certain questions. In approaching this matter one had to consider the varied characteristics and demands of the two settings. Thus, the day care center's orientations were, for the most part, in terms of an unstructured, "open-ended" kind of environment in which the children usually had the option of deciding what they wanted to do and with whom they wanted to do it. Under such conditions a much wider array of behavior and feelings were likely than in the more structured setting of the public school where a greater emphasis was placed on obedience and performing in line with the teacher's directives.

Given the differing expectations of these two settings one might anticipate that a definite set of relationships would exist in terms of the child's functioning within each situation; however, one would not necessarily expect a one to one correspondence in exactly the same ratings and consequently not judge the reliability of the assessments from that vantage point. In order to examine this premise, correlation matrices were generated comparing all ratings made by the day care center teachers with those made on the same children by the public school teachers. Separate matrices were constructed for each particular sample and assessment. Thus, there were the Culver City Kindergarteners as assessed in December of 1972, the Culver City Day Care Siblings as assessed at the same time, the San Pablo Kindergarteners as assessed in December 1972,

etc. A total of 12 matreces representing the 12 samples were generated.

Scanning these various matreces one could then ask, what percentage of the possible significant correlations are obtained when comparing the same rating as made by the day care center and public school teacher. In general the percentages were low. For two task related ratings, the ability to follow instructions and the quality of production in self-initiated tasks, 50% and 38% respectively of the possible correlations were significant.

To test whether the different settings might stimulate different behaviors which nevertheless would intercorrelate in a consistent and in that sense reliable manner, all the possible comparisons between day care center and public school teacher ratings were examined. This was done by tallying the number of significant correlations found between any given center-teacher rating and all other public school teacher ratings across the various samples (and vice-versa) and then computing the percentage of possible significant correlations this represented. Thus, for example, in inspecting the correlations between the center teacher rating of ability to follow instructions (VIIa) and the various public school teacher ratings for the assorted matreces, there were 36 significant correlations out of a potential 136 (or 26%).

The center ratings which appeared to be potentially useful predictors of various aspects of public school functioning included those pertaining to:

1. The ability to follow instructions (VIIa) significantly correlated 26% of the time
2. Overall adjustment (XI) significantly correlated 25% of the time
3. Quality of production on self-initiated tasks (VIc) " " 22% " " "
4. Positive peer contacts (III) " " 21% " " "

Certain other items with similar, but slightly lesser predictive

promise (i.e. significantly correlated with school ratings about 18% of the time) included:

1. Degree of positive contact with children (II)
2. Cooperation with peers (V)
3. Aggressive control (VIII)
4. Behavior (IX)

In contrast to the above pattern of center to public school correlations, it was revealing to find that the picture looked somewhat different when analyzing the extent to which the public school ratings could be predictive of the children's functioning in the center. Thus, whereas those aspects of center functioning which tended to be most predictive of school functioning were essentially the more behavioral, emotional/relationship variables, the school-rated items most predictive of good center functioning were overwhelmingly task oriented in nature.

The school-rated items significantly correlating most frequently with various center ratings were those concerning the quality of the child's task productions (VIc and VIIc each correlated significantly with center ratings about 31% of the time) while other aspects of task orientation (VIa, VIb, VIIa, VIIb), and overall adjustment (XI) did so about 20% of the time.

While there are promising trends evident in these correlational analyses, one must exercise care in deriving firm conclusions from them because of the previously noted limitations such as sample sizes and personnel changes. However, considering the continued consistency of the task oriented kinds of findings, it seems highly plausible that at least they reflect a genuine phenomena which will continue to be apparent in further samples.



#### VIII. THE DEVELOPMENT OF BOBBY AND HIS FAMILY: A CASE ILLUSTRATION.

In order to view our work in greater specificity, one child and his family will be given in more detail.

##### A. Descriptions From the Work With the Parents.

Bobby was 3 years, 1 month when his mother brought him to the day care center. Father, then age 24, had become almost totally incapacitated with an illness which subsequently led to his death after Bobby had been in the children's center about four months. At the time of application, mother, age 20 was herself recovering from surgery and was scheduled to return to a full-time job following a two-and-one-half month leave of absence. The family was receiving public assistance, was eligible for our service, and had been refused by several private day care centers because Bobby was not sufficiently toilet trained, having problems mainly in the area of bowel control.

Mother was 16 when parents married, having known each other for six months. Pregnancy when she was 17 was unplanned but acceptable. Pregnancy and delivery were normal. Developmental milestones were normal except that speech developed somewhat slowly which mother felt was due to adverse environmental conditions. Mother began working when Bobby was 5 months old because father had lost his job and the family was desperate for money. Father finally located another job about five months later ~~but he also had developed colitis~~ <sup>left</sup> ~~because of the severity of his illness.~~ <sup>near</sup> after a short time he ~~quit~~ that job and did not work again. Maternal grandparents, who with their unmarried children lived ~~across the street~~ from the parents, cared for Bobby during the few months that the parents were employed simultaneously, as well as during times that the father's illness prevented him from giving even minimal care to the child. Also, every few months Bobby would be sent for a two-week visit with his paternal grandmother in a nearby city. However, he spent most of his days from age 5 months until we met him at age 3

in a small, shabby, second-floor apartment with a father who was mainly bed-ridden, often sleeping, and almost always too ill to respond with anything but intense impatience. This was particularly relevant to two of the areas in which Bobby was having difficulty, toilet training and speech development. While mother attempted toilet training on her day off, father found it expedient to keep Bobby in diapers the other six days. Father's need for quiet often provoked outbursts like, "Can't you get that kid to shut up; all he does is chatter-chatter-chatter."

During the first month of the social worker's contacts with mother, interviews were scheduled as needed and were focused mainly on Bobby's entrance into the program, with particular attention to the emotional implications for both mother and child. Other staff members and the social worker became increasingly aware of the extremely guarded, constricted, affectless quality in mother which was evident not only in her response to new people in her life, but also characterized her relationship with Bobby. Accordingly, interviews were set up on a weekly basis in the hope that through the continuity of a supportive relationship, she could be helped to relax her guard, move into greater acceptance and a greater awareness of her feelings, and ultimately be more aware of and responsive to Bobby's feelings. She accepted the plan for weekly sessions with passive compliance, initially had some difficulty in getting herself to the appointments, and only through a gradually established pattern of steady punctual arrivals did she begin to reveal the importance that the contact was coming to have for her. For a long time, the only area of her life which she could discuss with any semblance of animation was her work as a <sup>Saleswoman</sup> checker in a large department discount store, and for a long time the social worker used this part of her life as the area in which to help her to consciously experience and discuss feelings.

Very slowly these discussions expanded to other areas of her life and soon there were indications that the loosening of the repression was being positively reflected in her relationship with the social worker, with other staff members, and finally with Bobby himself.

As her husband's condition continued to deteriorate, she was gradually able to allow herself to face the possibility and then the imminence of his death. Although with great difficulty and still considerable constriction, she was able to some degree to prepare Bobby and then be somewhat responsive to his questions and concerns when the death did occur. In the six months since then, the work has deepened as she became increasingly able to express feelings about her obesity, lack of friends, disappointment in her life to this point, and her fears about her future as a single parent. She is beginning to perceive some connections between her feelings about her present life and self and her experiences and feelings as a child in her own family. The work is beginning to focus on the many projections which reveal themselves in her relationships and her perceptions of people's feelings about her. A dramatic example occurred at the children's center Christmas party. She had expected to arrive late because of her working hours and kept to the late hour even though she did not work and could have come earlier, arriving with Bobby just after Santa Claus had finished distributing gifts. She felt very angry at not being told what time Santa Claus would be there and projected her anger onto the other parents, feeling that they were looking at her and wondering, "Who is that weirdo?" In response, she sat in a corner where she maintained a stony isolation which was impenetrable. In contrast to this picture, however, is a significant example of change which has occurred in a real relationship. From a lifetime of feeling that she could not talk to her mother, she has recently begun to arrange that they have lunch together on her day off and she describes her amazement and delight in discovering

how thoroughly she is enjoying their conversations.

Not evidenced until after the 5 month interval was Mrs. C's increasing difficulty in talking to her social worker for fear that what she had to say was not important and would be criticized. Transference interpretations linking this to her fear of being criticized by both her parents led to a deepening relationship and her increasing ability to deal with all levels of feeling reactions.

B. Description from the Period Analysis.

It will be recalled that the daily observations of the child by the observers, teachers and social workers are abstracted into a series of developmental periods. Those for the first five months of Bobby's stay are given below. It is important to note that this account integrates observation and interpretation whereas in the original observations these are carefully separated.

Period 1 - The sandbox as his homebase in the center: Previsit through the 6th day. Bobby seemed to have no problems separating from his mother; he was eager to come. He moved quickly to the sandbox and this appeared to be his base away from home and mother. Here he was engaged in making piles of sand or digging holes. At times he very meticulously piled some of the sand away from the box on a cement sidewalk as if in this way to test just what the rules of the center were. He seemed hypersensitive to airplane noises but, by contrast, at times unaware of what people were saying to him. As shown in the video tapes that were made of this scene, his face had a strikingly even monotone quality. Bobby looked handsome but on second look a certain varied human quality was missing. The continued involvement in the sandbox during the first three days took on a compulsive quality. The potential link to underlying repressed anal derivatives was supported when he soiled himself on the fourth day and then

developed a severe diarrhea. It is of course possible that the illness itself brought on the soiling. The total experience, however, seemed one of a desperate holding on to the home base in the sandpile, but then suddenly everything got out of control and he did not in fact attend the center for several days.

Period 2 - Bobby becomes involved, if encouraged, and smiles at the observers: From the 7th through the 12th day. This period is typified by his again coming readily to the center. New was the fact that he openly showed that he might prefer to be with his mother. These signs of longing had been absent previously. That he was, however, more attached to the observers, whom he smiled at occasionally, than either the teachers or the peers was not a typical development. Whenever he was helped, he would get involved in things such as painting, climbing the jungle gym, or even making a picture for teacher Jean. Most of his activity, however, was still in the sandbox or consisted of riding a tricycle by himself. His speech was still extremely difficult to comprehend; however, by the 12th day he was making sentences relating to the wading pool, which seemed to fascinate him particularly, but which he had to avoid assiduously.

Period 3 - Bobby is more assertive and interacts with peers: From the 13th through the 18th day. New in this period was Bobby's greater assertiveness and his ability to express aggressive scenes in his play. He could defend himself better against peers and took part in fantasy games where he was the barking dog or an attacking monster or someone firing a gun at a girl. He still could not get the names of the children right -- he seemed to be using them like miscellaneous labels. By the 15th day there was, however, an important change in that for the first time one could observe a give-and-take interaction with another boy, Louis.

Period 4 - Bobby is engaged in an art activity and now knows peers' names: From the 19th through the 33rd day. This period is delineated first of all because of the qualitatively different involvement in art activity that occurred on the 19th day. His engagement was intense even though he still called the glue "water". Pride also emerged for the first time. For example, on the 22nd day, after making a roadway, he was very happy and said, "I did it!"

Perhaps even more important than the engagement was the fact that during this period he began to call people correctly by their names. He talked about his turn. He called Alma's attention to the rain by saying, "See the rain!" He knew the names now of all the children. It is, therefore, interesting that despite this growth he seemed to be very frightened when the children pretended playing ghosts. They put blankets over their heads and one really had the feeling that Bobby didn't quite know what this was all about and sometimes really believed they were ghosts.

Period 5 - Bobby refers to "My Anna" (the teacher) and paints his "ka-ka" (feces): From the 34th to the 40th day. The first clear sign of his definitive relationship to his teacher, Anna, was seen on the 34th day when he referred to her as "My Anna." Then on this same day he spoke of his "ka-ke" (feces) and then painted them. This suggests that the developing reaching out to people was part and parcel of his greater verbal control of certain anal derivatives. That is, there was both a freeing of these derivatives through the painting but some mastery of them through the talking about it. Most interesting in this regard is the fact that during this period soiling and wetting still occurred in the daytime but was not to be seen after this period. The development seen in the areas of engagement, assertiveness, and peer relations very much continued.

Period 6 - Bobby reacts with open feelings to father's critical state and becomes further involved emotionally with the teachers: Days 41 through 50. This period was marked by the profound increase in the father's illness. This meant that the father was often not at home and Bobby reacted by overtly fretting more in general and especially as he was brought to the center. The intense longing for his father could be seen in his play and in moments of depressed-like gazing. Most important though was the fact that he could move from this open fretting to relating to the teachers and allowing them to help him engage in such things as play with tiles, toys, and playdoh. His struggle with aggression continued as he tended to feign aggression as he saw it in other children rather than being actively involved. It had a certain "as if" character to it but the previously seen assertion of himself and the emergence of aggressive derivatives very much continued alongside this behavior. What was really new then was the combination of the initial fretting followed by considerable engagement with people and tasks. This indeed seemed to set the stage for what was to be a very important period of his development.

Period 7 - Bobby's feeling expression, his peer relations, and his speech expand in response to mother's strikingly greater feeling availability: Days 51 through 79. Father was back in the home during this time but clearly more important, this was the time when the mother changed dramatically in the sense of becoming more alive in her total approach to people and to Bobby in particular. This was very soon after a dramatic session in which the social worker could help her to express more of her feelings. Symbolic of this was the mother's previously felt concern that if she ever started crying, she would never stop. Now, instead, she allowed expression of feeling from herself and from Bobby and most important began to talk to him in the sense of verbally reflecting his feelings and answering his questions. We believe that the new

behavior seen in Bobby was intimately related to these changes in the mother. It was the first time that he went into the water at the beach and was also the first time that he took his clothes off with ease. He was talking a great deal more in whole sentences and talking about his trip to the beach and to Disneyland. This was the time when he stopped disturbing the other children during naptime. As already noted, his soiling now was practically eliminated. The selective involvement in certain tasks, such as carpentry, blocks, tricycles, and in various water projects very much continued. There were other times, though, when his engagement was zero and certainly his absolute level of task orientation was still very low by comparison with other three-year-olds.

Also new were his more definite contacts with certain children, such as David, Louis, and Michael. He shared his playdoh with Michael. He and Louis played trucks together. He was even able to invite Michael and exclude Louis. He allowed David to pour water on him. One could not yet speak of a real peer partnership but there were definite beginning attempts.

Also new was his tendency to crash into one of the observers or the female director with his tricycle or even to throw sand at them. This was playful and his cheerfulness and assertiveness would expand as he could allow himself to do this. We interpreted this as a move from a predominant preoccupation with anal themes to a beginning phallic aggressiveness even though this was still tinged with some sadism.

Period 8 - Bobby's feeling expression, peer partnership, and verbal communication again expand - longing for the person is clearly experienced:

Days 80 through 109. This was the period from shortly before the father's death to the time that his mother received a job promotion. There is little doubt that the death did have an immediate impact. At moments he was stunned and passive and then would suddenly charge impulsively only to be hit by the other



children. On the day that his father died, he defended his tricycle successfully against Peter but finally bit him as it seemed he was losing and then bit himself fiercely as well. This self-biting was not seen again and no doubt expressed some of the desperateness of his feelings on this difficult day of his life.

The fretting for the mother increased again at this time. Having lost one parent, he would be more concerned about losing the other. Yet in a strange way the absence of the father, who previously had demanded repression of feelings because of his illness, and the new expansive approach of the mother herself may well have allowed Bobby to express more of his feelings generally, including longing for the person.

This increasing ability to express his need for the person would be consistent with his increasing capacity to move out to people in the center, to communicate clearly with them, and to interact with Peter and Michael in such a way that one began to get the feeling of some real partnership. Thus, he shared horses with Peter in a complicated interaction or he shared his toy streetcar with another child. For the first time Peter and Bobby were now seen together quite often. Similarly, right after some intense fretting for his mother and a need to avoid all people, he was seen with Michael in a friendly and sustained relationship. Or, he could now equally easily move from the fretting to involvement in such tasks as playdoh.

There were quite a number of observations which potentially related to his reactions to the death of his father. At times he would say that daddy was dead, daddy was gone, but then the next day he would say, "I went to Disneyland with Daddy." This kind of talk might then continue in a kind of talking to himself which was hard to understand. His play also displayed him in the role

of kicking over certain tower-like structures. It suggested that he might have some fantasy of having contributed to the death of his father. This, however, was unclear and needed further exploration.

Other developmental concerns related now not so much to the quality of his behavior alone, because in many ways he had changed quite dramatically, but to his need to catch up in several areas of behavior. Certainly his task orientation was, in absolute terms, still lagging far behind his age group. Similarly, his peer partnerships, though beginning, had far to go. Thirdly, while his ability to actively express his longing for people, and particularly his mother, represented a tremendous development for this boy, he also revealed that a process of individuation would now have to take place. Here again we anticipated that relieving the mother of her guilt about leaving Bobby, as well as enhancing her general confidence, ambition, hope and capacity to express her feelings, would aid in this process of separation-individuation.

Once more stressing the change was the difference in the video tapes shot at about 5 months when compared to those made during his first day. Varied emotions are seen in his face. He is involved in tasks and defends himself against other children who want to take things from him. He is an alive-looking child, even though not as handsome-looking as he was in the very beginning.

#### C. Description From the Doll Play.

Bobby's doll play session, which was administered approximately five months after his entry, reveals both his strengths and his continuing developmental problems. For one of the first times in some time he had separated easily from his mother and become immediately involved in car and tractor play with Louis. At a moment when he seemed to lose his interest slightly, he was approached and asked if he would like to come and see some toys. He was clear

about not wanting to do that. Louis now volunteered to go and when asked whether he might be willing to come with Bobby, both now joined the observer and the two boys were soon enthusiastically involved in playing with the cars that are part of the doll play set. Again showing his increased ability to move into new situations was Bobby's ease in letting Louis go back to the classroom.

Once alone though he seemed more hesitant, still continued to make cars crash into each other and then seemed to fluctuate back and forth between this type of car play and other play which seemed more suggestive of unresolved anal conflicts. Thus, he made the large sausages and called them such, but then moved back again to the car play and these cars now suddenly crashed into and on top of the male and female dolls. Now he became anxious and retreated to a more perfunctory, rigid moving of the doll play furniture and asking about the various pieces. Here again his progress was obvious in his considerable verbal control. Gradually, he could show his greatest involvement with the bathtub and the toilet. His face lit up as he spoke about "ke-ke" and "ka-ka". Again, though, there was what seemed like a play disruption. He did not become excessively anxious but his involvement was certainly limited from there on out. Showing again the limits to his absolute involvement in tasks was the fact that he could not respond to the observer's request to draw a picture. In fact, he resisted any request from the observer including, of course, initially even coming with him.

#### D. Data From the Psychological Testing at 6 Weeks and 5 Months

Unlike most children, Bobby showed no advance in his 6-week performance on the Stanford Binet when compared with his performance at the beginning of his entry into the day care center. The entry I.Q. was 83 and that at 6 weeks was 84. His difficulty in moving into new situations and relationships was seen in this testing. Initially he simply refused with a very firm "no". On

the second effort, however, he could be coaxed by both considerable attention and the offering of two small plastic animals. Not surprisingly, once in the testing situation he exhibited a very short attention span and after twenty minutes could hardly cooperate any longer. Even during this time he was easily distracted. It became clear that he was very much concerned about separation from a caretaking adult as he played hiding from the tester. When asked "Where's Bobby?" he would respond with "Bobby gone." He enjoyed getting under the desk and banging on both sides as hard as he could, clearly taking delight in his ability to produce so much noise. In addition, he repeatedly climbed up on one of the chairs in the room and explored various manners of getting out of the chair, including crawling and all kinds of jumping. As he was doing this, he would say "Me climb up," or "Me jump." The use of the word "me" here indicates something of his language and personal identity development.

This interpretation of his age-inadequate labeling was very much supported by his inability to find word labels for common objects. For example, he labeled a fork and a flag as a spoon and a tree. This weakness in turn may be related to his difficulty in retaining the memory of a pictured animal as if he could not retain the labeled concept, and, in addition, would be distracted by other stimuli when asked to make the recall. By contrast to these areas of functioning, he could join two halves of a picture to form a whole and thus showed his ability to manipulate materials in a meaningful way.

At 5 months Bobby still showed some difficulties in moving into the testing situation and arrangements had in fact been made to have the mother possibly accompany him. Again showing his progress was the fact that this turned out not to be necessary. Even more impressive was the gain in his total performance. He now scored an I.Q. of 96, representing a 14-point gain in a period of

three and one-half months. The tester felt that the primary reason for this was the striking improvement in Bobby's attention span and impulse control. He was able to work attentively for nearly the full time. Even after he began to fatigue, it was much easier to return him to the task than in the previous session, and the previous marked negativism or resistance in the form of refusals was not present. Rather, he demonstrated now much pleasure in his performance. Thus, when he completed the bead stringing item, he said "I got a whole bunch." What should be noted here is the use of the pronoun "I" as opposed to "me" in previous testing. We believe this represents a greater clarity of self-concept and the accompanying positive self-feeling, in this instance, related to actual achievement. The tester noted that he could remain in the chair and did not constantly have to crawl off somewhere else. Even more important, she felt there was now a direct verbal interaction with her and this again very greatly facilitated the testing. Here then we have some specific confirmation of how the more direct feeling interaction with his mother might affect his testing performance. The need to go off into his private world, as the tester put it, was now minimal.

While there was improvement in all areas, he was still furthest behind in his verbal fluency and his ability to respond to picture items. However, the difficulty now was less in the labeling than in such concepts as "bigger and biggest" and in other comprehension items. He did now display good visual memory and could identify pictured items from description of their function or physical features. He was also able to make visual discrimination between various forms and to match forms on this basis. The good motor control in joining objects continued at this time.

#### E. Data From the Task Orientation Categories

It is of considerable interest to note that just as Bobby had the

lowest I.Q. score in the center at the six week assessment point, so he had the highest scores on disengagement and disruption at this same assessment time. It was indeed extremely difficult to keep him in the group situation. The scoring indicates that he was disrupting once every two minutes. By the five-month assessment, the scoring indicated one disruption every five minutes. This meant in effect that in a twenty-minute period, which is the average length of the group-structured time, he was disrupting four times. This vividly indicates then both a dramatic change and also the fact that, by comparison with his peers, he still needed to show considerable development. His disengagement had also declined but was still present. Notable was the fact that both his need to go onto a lap or his need to regress were now absent at five months. Once more showing his relative lack of development was a zero score under productivity. That is he could not yet, either when asked, or spontaneously, volunteer the kind of answer that would be judged as contributing to the group. We would expect, however, that by the twelfth month assessment of the task orientation, he would indeed show some signs of this behavior as well.

#### F. Concluding Remarks

The above case illustrates well both the measures that we have used and the emerging focus of our research. The mother's social worker rated her as changing +3 as a person and +1 as a parent. She noted, in terms of the more specific ratings, an increase in her capacity to maintain an organized environmental sequence. She also noted an increase in the energy and time available from mother to Bobby. On standards for aggression control, she rated a decrease of 2 points from the six-week to the five-month point. This was seen as a positive development in allowing Bobby more opportunity to express normal aggression. She noted that as a result of the weekly casework sessions, the mother had moved

from an unsmiling, constricted, almost depressive, demeanor to a more open, cheerful, relating person. The teachers had reported what she herself had noticed, namely, the mother's ability to work more directly with her own and Bobby's feelings. All this was particularly striking in relation to her husband's death. She could share her worries and fears and actively discuss Bobby's own anxieties and questions.

The period analysis, and particularly periods 6, 7 and 8, seem to us to demonstrate the impact of this greater emotional availability and clarity in communication from mother to child. While Bobby clearly made moves towards engagement with peers and "his Anna" by the six-week assessment point, this trend and especially his involvement with the teachers, was greatly accentuated in the period from the six-week point to the five-month assessment. We can see here then that a good center takes a child some distance in his development. But, at least in this and other cases, a change relevant to the child's functioning on the part of the parent is needed to enhance the child's further development. The fact that a considerable acceleration in his development did take place is documented by the data from the psychological testing, the task orientation categories, and the developmental ratings which showed an increase on the average of two points.

IX. RESULTS.

The findings of this study will be organized around the following statements:

- A. Both the Culver City and San Pablo day care centers enhance the development of the entering children after they have been there for 6 weeks.
- B. The children attending the Culver City Center sustain this gain to a greater extent during the period from 6 weeks to 5 months and this gain is in turn associated with progressive changes in the parent-child relationship as facilitated by a social work contact.
- C. The Culver City children continue to sustain their differential gain in the interval from 5 to 12 months as well as during their first year in Kindergarten.

A. The Progressive Development During the First Six Weeks of Day Care.

Taking the average Stanford Binet I.Q. as the measure of the children's development, and carefully matching the Culver City and San Pablo samples on age of entry, sex of child and initial I.Q. (109 and 108) we find that by six weeks after entry both groups show an average I.Q. of 117. The increment in I.Q. is extremely consistent and statistically significant for each group. Applying the Wilcoxon Matched-Pairs Signed Ranks test (two tailed) the difference is statistically significant between the .02 and .05 probability level for Culver City and at the .01 level for San Pablo. The average I.Q.'s are given in Table 2 and have been plotted in Figure 3.

Because the children were initially not tested at Entry, these findings



are in part based on recent samples. This accounts for the discontinuity in the curves of Figure 3 at the 6-week point.

Given the fact that we are relying on one measure, it could be argued that we are simply measuring the children's ability to adjust to the strange testing situation. A minimal statement would be that on this measure there is no detrimental effect and the groups do not differ. The qualitative period analysis of the first six weeks of the Culver City sample and knowledge of the San Pablo sample does indicate that a progressive adaptation is taking place for most children during the first six weeks.

B. From 6 Weeks to 5 Months: Change in the Child as a Function of Parent-Child Change.

During this interval the children in the Culver City day care center tended as a group to sustain the gains in I.Q. that they had achieved in the first six weeks of day care. By contrast the average Stanford Binet for the San Pablo children declined significantly (See Figure 3, and Table 10.). The average change in I.Q. from 6 weeks to 5 months showed a gain of 3.5 points for the Culver City sample and a decline of 3.5 points for the San Pablo sample, a statistically significant difference between the .01 and .001 probability levels as determined by the t test of mean difference.

To understand the reasons for this important differentiation in trend, the data analysis was shifted from a comparison of the two groups to analysis of the sources of variation within the Culver City sample. Noting that there were indeed important differences in development, it was further determined that a great number of the child development indices including I.Q. correlated with each other and were in turn found to be a function of the quality and changes in the parent-child functioning. In order to provide support for this conclusion, we divided the data presentation into three steps:

1. A study of the intercorrelation of child indices.
2. A study of the intercorrelation of parent-child ratings; and
3. A study of the association between child indices and parent-child ratings.

#### The Intercorrelation of Child Indices.

Five child development ratings, the Stanford-Binet I.Q. score, and seven task orientation category scores are available on each of the 25 children 6 weeks and 5 months after entry into day care. The intercorrelation of these measures are given in Tables 3 and 4. Factor analysis of these correlation coefficients would be possible, but we have decided to postpone this until all data collection is completed.

Visual examination of Tables 3 and 4 reveals considerable intercorrelation suggesting that the indices are tapping slightly different aspects of the child's total development. Thus, the more inclusive rating of the child's adaptation correlates for both the 6-week and 5-month point at the .01 level of statistical significance with a successful psychological move from home to the center, the development of peer relations, the ability to modulate aggression, the global rating of the child's task orientation, and negatively with the specific task category of disruption of the task. The Stanford Binet I.Q. correlates at the .01 level with at least one component of this cluster at each assessment point: The task orientation rating at 6 weeks (.62\*\*) and the adaptation rating at 5 months (.49\*\*). Within this cluster, the importance of the categories of disruption and disengagement as differentiators of the children's behavior should be stressed. They intercorrelate significantly at both the 6-Week and 5-Month point (.73\*\* and .59\*\*).

Relating these findings to the hypotheses on the intercorrelation of task orientation at about 3 to 4 years of age with psychological move, peer relations, aggression modulation, and I.Q., we find that hypotheses 1 through 3 on pages 3 and 4 do indeed receive support at the 6-week point. These stated that task orientation of 3 to 4 years of age was related to a successful psychological move from home to center, adequate aggression modulation, and higher performance on the I.Q. test.

Table 5 gives the intercorrelation of the 6-week to 5-month change scores for the child indices. Just as the general adaptation rating correlated positively at each assessment point with each of the developmental ratings, with the Stanford-Binet I.Q., and negatively with the specific task category of disruption, so the intercorrelation of the change scores based on these dimensions shows a similar pattern. Furthermore, the children whose rate of disrupting the task declines also show a decline in their disengagement and less regressive behavior.

These findings on the changes in the children's behavior best lend themselves to a summary of the findings on the child indices. Children who are rated as improving in their general adaptation from 6 weeks to 5 months also show progressive development in their psychological move from home to Center, their peer relations, their modulation of aggression, their Stanford Binet I.Q. score, and their task orientation as measured in a variety of ways.

It follows from the above that if in the 6-week to 5-month interval the Culver City children as a group showed a more positive development in their I.Q. than did the San Pablo children, then they should also show a more progressive group trend in the various ratings and task orientation categories. This is in fact true for the child development ratings which increase. Similarly, the

task categories of lap and regression decline from 6 weeks to 5 months and those for productivity and interest increase. Statistical comparison of the average ratings for the two centers is, however, at this point likely to be misleading because the ratings on the San Pablo children are based on significantly less information. The final report of this work dealing with larger samples will present a more systematic analysis of this question.

#### The Intercorrelation of Parent-Child Ratings.

Before studying the pattern of association between the various parent-child ratings, it is important to remind the reader of the reliability assessment of each rating at 6 weeks and 5 months (See Table 1 for these results.).

The intercorrelation of parent ratings for the 6-week and 5-month point is given in Tables 6 and 7. Examination reveals first of all that except for the unreliable ratings, the pattern of intercorrelations is very similar at both assessment points. A factor analytic study might well be appropriate but again we prefer to wait until our further samples are completed. Visual examination of the patterns as well as some logical grouping suggests the clusters diagrammed in Figure 4. While all the reliable parent-child ratings intercorrelate to a considerable extent, parents who communicate clearly with their children are most likely going to be affectionate and clear in their availability. Similarly, those who actively instruct their child also organize the environment and set limits more effectively. Finally, those parents who have conceptual exchanges with their children also move them to new experiences and are interested in academic achievement.

Table 8 gives the intercorrelation of the change in parent-child rating scores. For easier comprehension a table revealing the ratings most highly intercorrelated is also given (See Table 9.).

It can be seen that the parents whose impact on their child was rated as generally most improved on the global parent change rating increased both the clarity and time of their emotional availability, and the clarity and frequency of the communication with their child. They also tended to increase the active instruction of their child and more frequently moved him or her to new experiences.

The Association of Child Indices and Parent-Child Ratings.

The above analyses, though not complete in the sense of awaiting further samples, do strongly suggest the importance of the following child indices and parent-child rating clusters:

Child Indices

Adaptation

Psychological Move

Modulation of Aggression

Peer Relationships

Task Orientation Rating

Stanford Binet I.Q.

Disruption of Task

Parent Child Clusters

Clarity of Communication:

Affection; Time Available;

Clarity of Availability

Conceptual Exchange: Move to

New Experience; Academic

Standards

Active Instruction: Organized

Environment; Setting Limits

Figures 5, 6 and 7 show the intercorrelation of the two sets of measures, child and parent-child at 6 weeks, at 5 months, and in terms of the change measures between these two points.

Adaptation, Psychological Move, and Modulation of Aggression. These three indices do not correlate to a significant extent with any of the parent-child ratings at 6 weeks, but at 5 months they do correlate with three or more of the ratings, making up the clarity of communication/affection/time available/clarity of availability cluster. Also important to note is that the child index of a progressive psychological move from home to center correlates with the parent's moving the child to new experiences and setting academic standards.

The change in these three indices is also most strikingly influenced by changes in the parent-child ratings of the clarity of communication/affection/time available/clarity of availability cluster. Each of them is correlated with either the time available and/or clarity of availability change rating to such an extent that the correlation coefficient reached the .01 level of significance.

The change scores for adaptation, psychological move, and modulation of aggression also correlate with parent changes from 6 weeks to 5 months in the extent of conceptual exchange and moving the child to new experiences, but these correlations are not as striking.

The fact that the development of peer relationships does not correlate significantly with any of the parent-child ratings should also be noted. This is surprising and once more it has been decided to hold interpretation of this finding until our samples are sufficiently large to allow further data analysis and replication.

Task Orientation, the Stanford Binet I.Q., and Disruption of the Group Task. These three indices with their more direct implications for the child's learning are at 6 weeks strongly associated with the cluster including the ratings of conceptual exchange, the parent moving the child to new experiences, and striving for academic achievement. They are also strongly correlated with the cluster

described by Active Instruction. There is a generally weaker pattern of associations with the cluster described by clarity of communication, clarity of availability, and parent-child affection.

As such this picture at 6 weeks gives strong support to the previously stated hypothesis relating parent-child variables to task orientation (See page 41 hypothesis 2). This stated that the child's task orientation from three to ten would be influenced by the parent's affection, sensitivity to needs, clear communication, encouragement of new experiences, effective limit setting and explicit achievement pressure. While limit setting did not emerge as significantly correlated with task orientation at 6 weeks, another variable, active instruction, which is correlated with limit setting, did correlate with task orientation and I.Q.

By 5 months the picture has started to change. For the Stanford Binet I.Q. score, the correlation with the Conceptual Exchange/ Move to New Experience/ Academic Standards cluster and the Active Instruction ratings is still strong. But for this index and even more for the task orientation rating and the disruptions of the group task, the correlations with the Clarity of Communication/Affection/ etc. cluster are more frequent and statistically more significant than they were at 6 weeks.

It is, therefore, of special interest that the changes in all three of these child indices, task orientation, Stanford Binet I.Q., and disruption of the group task are consistently correlated with changes in only one parent-child rating, namely the clarity of the psychological availability of the parent.

Concluding this section, it would seem that changes in the various ratings of the clarity of communications cluster are during the 6-week to 5-month interval most strikingly associated with changes in all of the child indices except

peer relations. Of the ratings in this cluster, whether or not the mother and/or father change both in the extent but especially in the clarity of their availability seems most important (See Figure 7).

C. The Culver City Children Sustain Their Developmental Gains in the 5 to 12 Months Interval and in Kindergarten.

If an important differentiation takes place between the Culver City and San Pablo sample from 6 weeks to 5 months after entry into day care, it becomes of interest whether this differentiation is or is not maintained. Because data collection is still proceeding, different samples will be used to answer different questions. In each group comparison we have, however, matched the groups in terms of initial score, whether this be the I.Q. or a rating.

Thus, to follow the I.Q. trends for the two samples from entry to 12 months we had to deal with two different group comparisons because the initial samples were not tested at entry. The first, which we have already discussed involved two samples on whom we had sufficient entry-to-6-weeks I.Q. scores to make a comparison. The increase in each of the groups, Culver City and San Pablo, was significant and indeed very similar (See Table 2 and Figure 3). The average Stanford Binet I.Q.'s reported by the Early Training demonstration and control groups have also been plotted in Figure 3. All those groups of children involved in a pre-school program showed this initial rise while the Early Training control group did not. The similarity in the nature of the trend for the two groups, San Pablo and Early Training, who had both some pre-school and some contact with the family is indeed striking. There is an initial rise and then a considerable decrement in the average I.Q. The Culver City children whose families experience extensive social work do not show this decrement.



The second comparison involves the average I.Q. trends from the 6 week to 5-and-12 month point. The Culver City and San Pablo groups are again carefully matched for age at entry, sex, and the base-line level which in this case is, of course, 6 weeks. As shown in Table 10 and in Figure 3, the Culver City children sustain their gains in the interval from 6 weeks to 12 months and this increment is statistically significant ( $.01 < P < .02$ ) when compared with the decline for the San Pablo sample.

A similar conclusion is reached when the 6-week level of the two groups is compared with the average I.Q. at entry into Kindergarten (See Table 11 and Figure 8). The samples are again matched for I.Q. at 6 weeks, age at entry, and sex of child. Comparison of the trends again indicates that the Culver City children showed a progressive as opposed to declining development. Since the children have at graduation from pre-school been in the program for varying lengths of time, the effect of this variable could be studied. Table 11 shows that the difference between the Culver City and San Pablo sample was most striking when the children had been in their respective programs for a year or more. This difference is mainly due to the fact that the Culver City children maintained their gains and the San Pablo children showed a decline. The greater period of time in a sense allowed these program differences to emerge.

The importance of the level of the child's I.Q. in the early Kindergarten period is underlined by the fact that this score was correlated significantly in the Culver City sample with the following ratings made by the public school teacher in December of the First Semester:

- LI Contact with Other Children
- III Positive Contact with Others
- VIII Control of Aggression
- X Expression of Happy Affects, and
- XI Overall Adjustment

A further step in the analysis involved comparison of the average change scores from December to June for the Culver City and San Pablo samples. Is the growth for the Culver City child during the Kindergarten year significantly different when contrasted with the San Pablo child? For each of the ratings listed below the Culver City children showed a more favorable development in Kindergarten:

|      |                                    |            |
|------|------------------------------------|------------|
| VIIa | The ability to Follow Instructions | $P < .014$ |
| III  | Positive Contacts with Others      | $P < .020$ |
| XI   | Overall Adjustment                 | $P < .029$ |
| V    | Cooperation with Peers             | $P < .050$ |
| VIII | Control of Aggression              | $P < .070$ |
| X    | Expression of Positive Affects     | $P < .071$ |

Although based on very small samples, it is of interest that four of the above ratings not only show a significant change but, as just shown, correlated with the I.Q. at the beginning of Kindergarten. For example, the child's I.Q. at the end of pre-school was correlated with the teachers rating of overall adjustment in December, and his overall adjustment rating in June was by comparison with his San Pablo match likely to be higher.

To conclude and review, it has been shown that the differential gain in I.Q. for the Culver City children is sustained at 12 months. Perhaps even more important, it was particularly the children who had been in the Culver City program for a year or more (who performed more adequately on the Stanford Binet I.Q. at the beginning of Kindergarten and according to their teacher showed a significant improvement in their adjustment during the Kindergarten year.

X SUMMARY AND DISCUSSION.

The above data analysis has provided considerable support for the hypothesis that children in the Culver City and San Pablo care centers showed a very similar and progressive development during the first six weeks of day care, but only in the Culver City sample was this progressive development sustained during the next 10 and one-half months of being in the program and during their first year of Kindergarten.

The differentiation of these trends first became visible in the 6-week to 5-month interval. It was, furthermore, hypothesized that this differentiation, and more specifically the more extensive progressive growth of many of the Culver City children, was a function of changes in their parent-child relationships and the latter in turn was influenced by a social work contact.

To arrive at the conclusion that change in the child is affected by change in the parent-child relationship, a series of analyses were undertaken. The intercorrelation of the various child indices was studied first and is best summarized by the findings on the change scores. Children who are rated as improving in their general adaptation from 6 weeks to 5 months, also show progressive development in their psychological move from home to center, their peer relations, their modulation of aggression, their Stanford Binet I.Q. score, and their task orientation as measured in a variety of ways.

The study of the intercorrelation of various parent-child ratings is also best summarized by the findings on the intercorrelation of change scores. Those parents who during the 6 weeks to 5 months changed the most on a global parent to child impact change rating are the same parents who increased both the clarity and time of their availability and the clarity and frequency of their communication with their child. They also tended to increase the active instruction of

their child and more frequently moved him to new experiences.

Finally interrelating the pattern of change in the child indices and that for the parent-child changes, it was found that the changes in all the major child indices except peer relations were correlated with changes in some component of the cluster describing clarity of parent-child communications, parent-child affection and the extent and clarity of the parents' availability. For this sample it would seem that changes in the clarity of the parents' availability were particularly strongly related to changes in the child's development.

These findings can be related to the development of Bobby and his family. While the mother had all along felt affection and liking for her child, her more depressed and repressed functioning made her often unavailable and would interfere with the clarity as to when she was available. Similarly, the verbal and affect-connected communication was limited. Emotional events of any sort were difficult for her to talk about. It was shown how the work with the social worker, among other things, allowed for greater affect-laden communication and this in turn was related to Bobby's greater feeling expression, general expansiveness, growth of speech, and reaching out to peers in particular (See page 60 Period 7).

It is recognized that certain changes in the mother may not affect the child and that there may be other changes very specific to a given mother-child relationship that are not captured by the level of abstraction made possible by our observations. These might well be revealed in a more intensive therapeutic contact with mother and child.

Since each child and family is analyzed as intensively as Bobby, we are in a position to state that in each instance where change took place in the mother's functioning, and this could be in a progressive or regressive direction, the specific impact and timing of this impact on the child could be demonstrated

through the period analysis. In certain instances of long term work with a mother, sources of conflict would be uncovered which would lead to the mother's temporary depression and thus unavailability. From the child's point of view, this change in parent functioning could have a regressive impact. It is our expectation that as the mother resolves such issues, the long-run impact on the child will be even more favorable. This will be illustrated in future reports.

The approach to early intervention which has yielded the above findings on how parent-child changes influence child development stresses that in each set of family-child interrelationships there are certain developmental problems whose solution can be greatly facilitated by working with the parents while at the same time exposing the child to an individualized pre-school curriculum. It is the general hypothesis that changes in family functioning are in the majority of cases needed to sustain the child's developmental progress. The initial evidence contrasting the Culver City and San Pablo population and the analyses within the Culver City population suggests this is the case. The assessments made after the children have been in the program for 12 and 24 months will be a further test of this hypothesis. This does not say that interventions focused directly on the child and/or the nature of pre-school environment make no impact. There are other possibilities: (1) Changes in the child from whatever source can affect the parent-child relationship; (2) the therapeutic work with the parent may be ineffective; and (3) even if effective work with the parent is done, therapeutic work with the young child may also be necessary. The last step is indeed being taken with two of the children in the sample.

Despite these reservations, the evidence of this report clearly suggests that a social work contact with parents of young poverty children participating in an individualized pre-school curriculum has an immediate and sustained beneficial impact on development of these parents and on the intellectual and social-

emotional development of their children.

## XI. IMPLICATIONS

The recent history of early intervention programs should alert us to the dangers of formulating policy on the basis of too little data. Since this research was, however, specifically designed to ask what additional factors could be introduced into current intervention approaches to make them more effective, some of the implications of our initial findings should be made explicit.

It is our assumption that the so-called "poverty cycle" is in part a question of certain parent-child experiences leading to a certain character or personality development which in turn leads to a total adjustment which does not favor the children of that generation. The girl who in her own childhood experienced parenting which left her feeling uncared for and lacking in confidence is very likely to feel inadequate in mothering a child especially if she has chosen a partner who himself still needs more care rather than having the inner strength to give to his wife and child and must therefore run from the situation.

Confronted with these facts two recent impressive publications had suggested ways of improving the income and housing of these people. In "Born to Fail," Britain's National Child Development Study suggests direct "expenditures that will raise low incomes and improve poor housing." (Time, Nov. 12, 1973, pp.88) Jencks (1972) in his study of Inequality comes to similar conclusions. Without wishing to dispute these solutions for breaking the extremes of the poverty cycle, we would argue on the basis of our findings that the integrated intervention directed to both the child and the family-child relationships described here enhances and sustains the potential of both child and the parents in such a way that they can indeed also take advantage of such economic and other opportunities as are available. These training and job opportunities must of course be available

to a sufficient extent, but our data show that only after contact with the Culver City center and especially with the social worker were the parents able to make use of their full job potential and more generally of their potential as people and parents. Again we stress that these correlations are suggested by our families. Different samples may lead to different conclusions.

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FIGURE I

Showing Data Collection Form

|             |            |               |                                              |  |
|-------------|------------|---------------|----------------------------------------------|--|
| Name: _____ | Ctr. _____ | Raters: _____ | Projected K<br>or Pub. School<br>Date: _____ |  |
|-------------|------------|---------------|----------------------------------------------|--|

**DUE DATES:**

|                         | Age: | Entry<br>(      ) | 6-wk<br>(      ) | 5-mo<br>(      ) | 12-mo<br>(      ) | 24-mo<br>(      ) |
|-------------------------|------|-------------------|------------------|------------------|-------------------|-------------------|
| STANFORD-BINET          |      | _____             | _____            | _____            | _____             | _____             |
| DEVELOPMENTAL PLAN      |      | _____             | _____            | _____            | _____             | _____             |
| CHILD DVLP RATING       |      | _____             | _____            | _____            | _____             | _____             |
| PARENT RATING           |      | _____             | _____            | _____            | _____             | _____             |
| DOLL PLAY               |      | _____             | _____            | _____            | _____             | _____             |
| FILMING                 |      | _____             | _____            | _____            | _____             | _____             |
| <u>TASK ORIENTATION</u> |      | _____             | _____            | _____            | _____             | _____             |

|                            |                     |                     |                              |
|----------------------------|---------------------|---------------------|------------------------------|
| Preschool Graduation _____ | Kindergarten _____  | Public School _____ | Time in Full Day care _____  |
| Termination _____          | Date of Entry _____ |                     | Time-Extended Day Care _____ |
| Date _____                 | School _____        |                     | Total Time in Center _____   |

Name (mo/fa) \_\_\_\_\_

Address \_\_\_\_\_

Tel: \_\_\_\_\_

Siblings in Center:

| Name  | B'date | Age   |
|-------|--------|-------|
| _____ | _____  | _____ |
| _____ | _____  | _____ |
| _____ | _____  | _____ |

FIGURE 2.

Showing Scoring of Paula's Entrance Into Nursery School

Days in Nursery School

| <u>CATEGORIES</u>             | <u>Sept. 19th - 1st Day</u><br>Mother there | <u>Sept. 20th - 2nd Day</u><br>Mother there       | <u>Sept. 21st - 3rd Day</u><br>Mother sometimes gone |
|-------------------------------|---------------------------------------------|---------------------------------------------------|------------------------------------------------------|
| <u>Reaction to Entrance</u>   |                                             |                                                   |                                                      |
| Major Approach                | Anxious then controlled play                | Anxious; then many activities                     | Sad, isolated, sits alone                            |
| Engagement                    | Limited - in doll play only                 | Fleeting                                          | Limited - with teacher                               |
| Sucking                       | Very little; some biting                    | Very little; some biting                          | Considerable                                         |
| Swinging                      | None                                        | None                                              | None                                                 |
| <u>Relationships to</u>       |                                             |                                                   |                                                      |
| Mother                        | Seeks affection and moves out               | Seeks affection and moves out                     | Seeks attention; longing                             |
| Student Teacher               | None evident                                | None evident                                      | Jumps with Molly                                     |
| Teacher                       | Points to Ethel's spilling                  | Asks permission to play                           | None evident                                         |
| Peers                         | Parallel play in doll corner with Ethel     | Parallel play in doll corner with Ethel and Donna | None evident                                         |
| Transitional objects          | None evident                                | None evident                                      | None evident                                         |
| <u>Defenses</u>               |                                             |                                                   |                                                      |
| Defensive identification      | Maternal: feed dolls                        | Maternal: feed dolls                              | Maternal: feed, clothe dolls                         |
| Passive to active             | Refuse to leave school                      | None evident                                      | None evident                                         |
| <u>Effects</u>                |                                             |                                                   |                                                      |
| Sadness Vs. Cheerful          | Some pleasure in play-doh                   | Vicariously enjoy mess                            | Mostly sad                                           |
| <u>Anxiety in relation to</u> |                                             |                                                   |                                                      |
| Separation                    | Control by turning to mother                | Near tears                                        | Near tears                                           |
| Messing                       | Concerned about spilled water               | Concerned about mess                              | Concerned about mess                                 |
| Aggression                    | None evident                                | None evident                                      | None evident                                         |
| <u> ego Development</u>       |                                             |                                                   |                                                      |
| Identification with teacher   | None evident                                | None evident                                      | None evident                                         |
| Passivity Vs. assertiveness   | Active - defends toy                        | Active - on move                                  | Passive - often sits                                 |
| Learn singing; story          | None evident                                | None evident                                      | None evident                                         |
| ride tricycle                 | None evident                                | None evident                                      | None evident                                         |

Days in Nursery School

| <u>CATEGORIES</u>             | <u>Sept. 22nd - 4th Day</u><br>Mother sometimes gone | <u>Sept. 23rd - 6th Day</u><br>Mother mostly gone | <u>Sept. 27th - 7th Day</u><br>Mother mostly gone |
|-------------------------------|------------------------------------------------------|---------------------------------------------------|---------------------------------------------------|
| <u>Reaction to Entrance</u>   |                                                      |                                                   |                                                   |
| Major Approach                | Cautious - then retreat                              | Very controlled, less anxious                     | Great longing; immobilized                        |
| Engagement                    | Some engagement; retreat from mess                   | Limited                                           | Limited - teacher facilitates                     |
| Sucking                       | Considerable                                         | Considerable                                      | A great deal                                      |
| Swinging                      | None                                                 | None                                              | None                                              |
| <u>Relationships to</u>       |                                                      |                                                   |                                                   |
| Mother                        | Seeks reassurance after mess                         | Some longing                                      | Longing; fretting                                 |
| Student teacher               | Molly attends; accepts help                          | Jump with: sit next to                            | Follow Sarah, Molly                               |
| Teacher                       | Attends: changes clothes                             | None evident                                      | Follow and sit close                              |
| Peers                         | Parallel play in doll corner. Read book to Bob       | Parallel play in doll corner                      | Parallel play in doll corner; defends right       |
| Transitional objects          | None evident                                         | None evident                                      | None evident                                      |
| <u>Defenses</u>               |                                                      |                                                   |                                                   |
| Defensive identification      | Maternal: feed dolls                                 | Maternal: feed dolls                              | Clean up excessive                                |
| Passive to active             | None evident                                         | None evident                                      | Not go to mother                                  |
| <u>Effects</u>                |                                                      |                                                   |                                                   |
| Sadness Vs. Cheerful          | Cheerful when mess                                   | Cheerful when mess                                | Sad except when mess                              |
| <u>Anxiety in relation to</u> |                                                      |                                                   |                                                   |
| Separation                    | Whines at end of morning                             | Near tears                                        | Near tears or crying                              |
| Messing                       | Greatly concerned                                    | Great concern; very clean                         | Considerable concern                              |
| Aggression                    | None evident                                         | None evident                                      | None evident                                      |
| <u>Language Development</u>   |                                                      |                                                   |                                                   |
| Identification with teacher   | None evident                                         | None evident                                      | Helps: Distributes toys                           |
| Passivity Vs. assertiveness   | Passive - often sits                                 | Passive and active                                | Immobile and defends                              |
| Learn singing; story          | None evident                                         | None evident                                      | Attend actively                                   |
| Ride tricycle                 | None evident                                         | None evident                                      | None evident                                      |

Days in Nursery School

| <u>CATEGORIES</u>             | <u>Sept. 28th - 8th Day</u><br>Mother mostly gone  | <u>Sept. 29th - 9th Day</u><br>Mother doesn't stay | <u>Oct. 3rd - 11th Day</u><br>Mother doesn't stay |
|-------------------------------|----------------------------------------------------|----------------------------------------------------|---------------------------------------------------|
| <u>Reaction to Entrance</u>   |                                                    |                                                    |                                                   |
| Major approach                | Great long'ng then cheer up a little               | Great long'ng; turn to teacher                     | Great long'ng; turn to teacher                    |
| Engagement                    | Limited - teacher facilitates                      | Very limited - teacher facilitates                 | Limited - teacher facilitates                     |
| Sucking                       | A great deal                                       | A great deal                                       | A great deal                                      |
| Swinging                      | Sarah swings some                                  | None evident                                       | None evident                                      |
| <u>Relationships to</u>       |                                                    |                                                    |                                                   |
| Mother                        | Longing, Seeks affection when hit                  | Great long'ng. Frets                               | Great long'ng                                     |
| Student teacher               | Seeks lap and swing: Sarah                         | Sarah:lap; Molly:play                              | Sarah:lap                                         |
| Teacher                       | Seeks lap. Little response otherwise               | Seeks comfort                                      | Seeks comfort for hurt                            |
| Peers                         | Limited: not tolerate aggression; jealous of swing | Limited: not share                                 | Parallel play in doll corner: defend rights       |
| Transitional objects          | None evident                                       | None evident                                       | Special gift from father                          |
| <u>Defenses</u>               |                                                    |                                                    |                                                   |
| Defensive identification      | Clean-up excessive                                 | Cry when can't help teacher                        | Maternal: comforts doll                           |
| Passive to active             | None evident                                       | None evident                                       | Sarah: runs away                                  |
| <u>Effects</u>                |                                                    |                                                    |                                                   |
| Sadness Vs. Cheerful          | Very sad                                           | Very sad                                           | Very sad, Play-doh cheers                         |
| <u>Anxiety in relation to</u> |                                                    |                                                    |                                                   |
| Separation                    | Near tears                                         | Near tears; barely holds on                        | Near tears                                        |
| Messing Aggression            | Considerable concern Not tolerate bump from Bob    | Considerable concern None evident                  | Some concern Not tolerate attack                  |
| <u>Motor Development</u>      |                                                    |                                                    |                                                   |
| Identification with teacher   | None evident                                       | Helps: set table                                   | None evident                                      |
| Passivity Vs. assertiveness   | Passive: stares                                    | Passive; subdued                                   | Passive and defends                               |
| Learn singing; story          | None evident                                       | Can attend                                         | Can attend                                        |
| Ride tricycle                 | None evident                                       | None evident                                       | None evident                                      |

Days in Nursery School

| <u>CATEGORIES</u>             | <u>Oct. 4th - 12th Day</u>             | <u>Oct. 5th - 13th Day</u>    | <u>Oct. 6th - 14th Day</u>               |
|-------------------------------|----------------------------------------|-------------------------------|------------------------------------------|
| <u>Reaction to Entrance</u>   | Mother doesn't stay                    | Mother doesn't stay           | Mother doesn't stay                      |
| Major approach                | Great longing; cries                   | Great longing                 | Happier after swing                      |
| Engagement                    | Limited; teacher facilitates           | Limited - teacher facilitates | considerable - teacher facilitates       |
| Sucking                       | A great deal                           | A great deal                  | A great deal                             |
| Swinging                      | Some from Sarah, teacher               | Some from teacher             | Extensive Sarah                          |
| <u>Relationship to</u>        |                                        |                               |                                          |
| Mother                        | Great longing                          | Cling plus longing            | Some longing                             |
| Student teacher               | Sarah: lap; Molly: play                | Sarah: lap excessive          | Sarah: swing                             |
| Teacher                       | Seeks swing, lap                       | Swing eases entrance          | Sarah: swing                             |
| Peers                         | Limited: not tolerate aggression: Kurt | Limited: little contact       | Parallel play in doll corner: Ethel      |
| Transitional objects          | Special gift from father               | Special gift from father      | None evident                             |
| <u>Defenses</u>               |                                        |                               |                                          |
| Defensive identification      | Maternal: feed, brush hair             | None evident                  | None evident                             |
| Passive to active             | None evident                           | None evident                  | Teacher: run away and back               |
| <u>Effects</u>                |                                        |                               |                                          |
| Sadness Vs. Cheerful          | Very sad; cries                        | Very sad                      | Smiles at teacher<br>Cheers up with play |
| <u>Anxiety in relation to</u> |                                        |                               |                                          |
| Separation                    | Cries; seeks mother                    | Near tears                    | Cry when can't swing                     |
| Messing                       | None evident                           | None evident                  | None evident                             |
| Aggression                    | Not tolerate attack: Kurt              | None evident                  | None evident                             |
| <u>Development</u>            |                                        |                               |                                          |
| Identification with teacher   | Help: set table                        | None evident                  | Help Sarah clean                         |
| Passivity Vs. assertiveness   | Passive: does little                   | Passive: does little          | Active, can't assert self                |
| Learn singing; story          | Can attend                             | None evident                  | Can attend                               |
| Recycle                       | None evident                           | None evident                  | None evident                             |

FIGURE 3

Showing Average Stanford Binet I.Q. Scores for Various  
Programs and Length of Time in Program

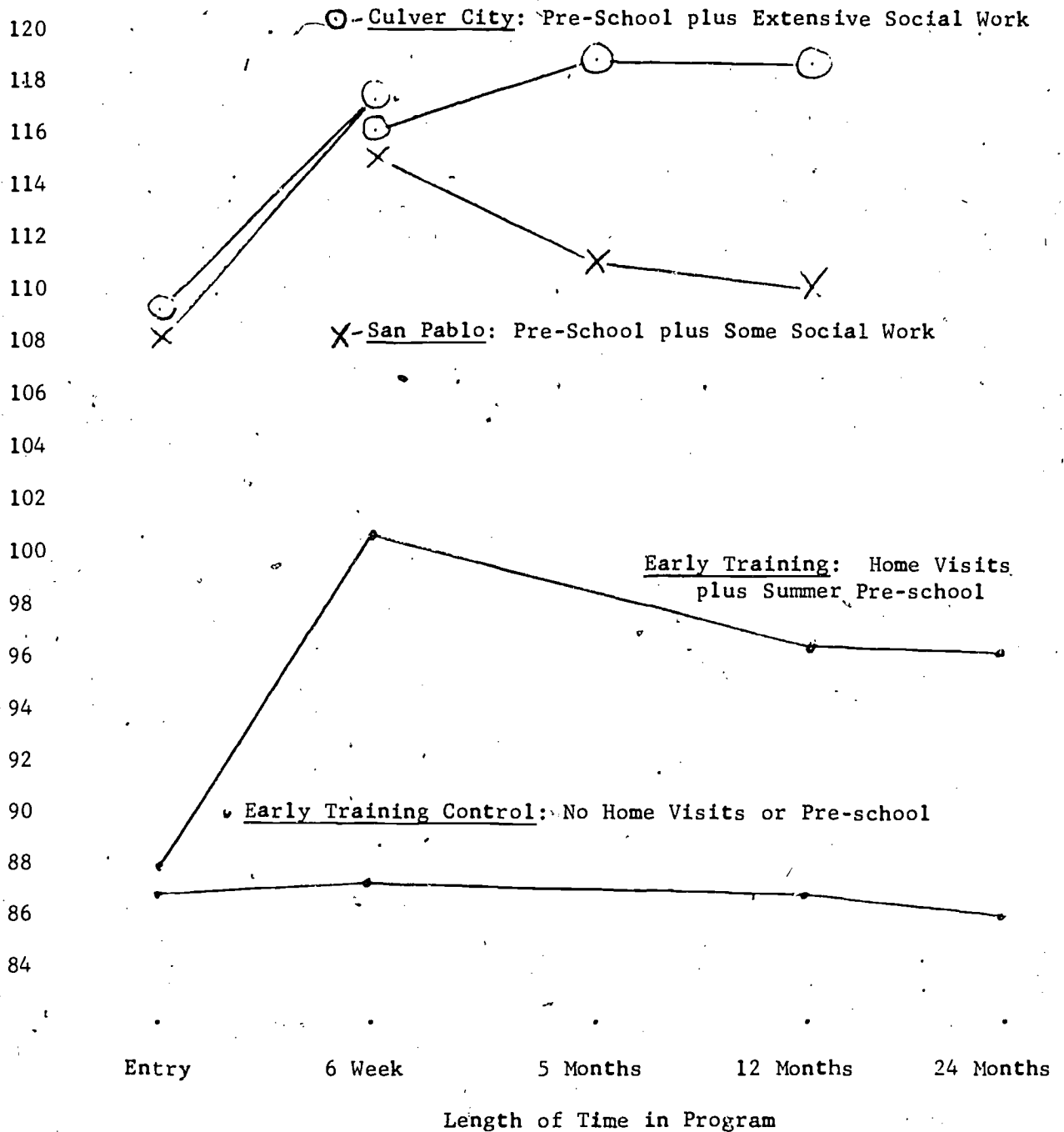


FIGURE 4

Showing Clusters of Parent-Child Ratings

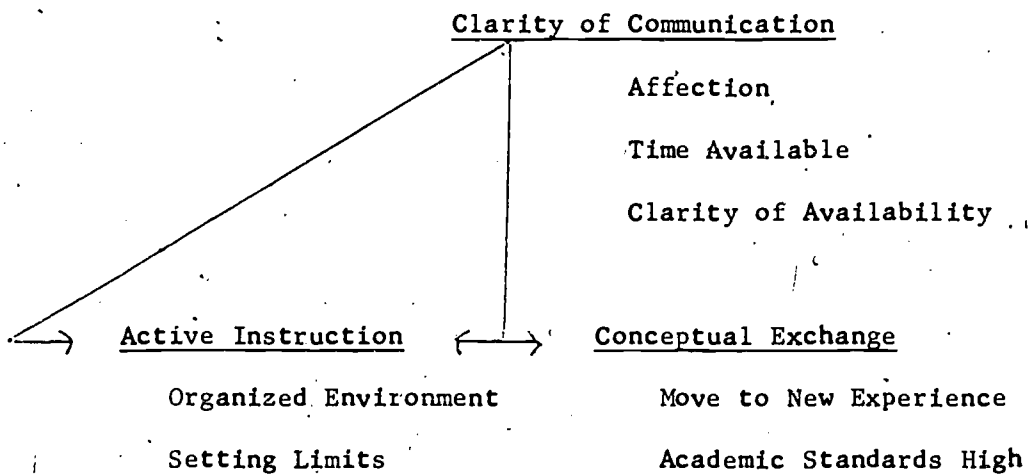


Figure 5

Showing Intercorrelation of Child Indices and Parent-Child Ratings at Six Weeks

PARENT-CHILD RATINGS

| <u>CHILD INDICES</u>        | <u>VII</u><br>Clarity of<br>Communication | <u>I</u><br>Affection | <u>II</u><br>Time<br>Available | <u>IV</u><br>Clarity of<br>Availability | <u>X</u><br>Conceptual<br>Exchange | <u>IX</u><br>Move to New<br>Experiences | <u>VI-e</u><br>Academic<br>Standards | <u>VIII</u><br>Active<br>Instruc. |
|-----------------------------|-------------------------------------------|-----------------------|--------------------------------|-----------------------------------------|------------------------------------|-----------------------------------------|--------------------------------------|-----------------------------------|
| Adaptation                  |                                           |                       |                                |                                         |                                    |                                         |                                      |                                   |
| Psychological<br>Move       | +                                         | +                     |                                |                                         | +                                  | ++                                      | ++                                   | +                                 |
| Modulation<br>of Aggression |                                           |                       |                                |                                         |                                    |                                         |                                      |                                   |
| Task Orientation            | +                                         |                       |                                |                                         | ++                                 | ++                                      | ++                                   | ++                                |
| Stanford-Binet I.Q.         |                                           |                       |                                |                                         |                                    |                                         |                                      |                                   |
| Disruption of<br>Group      | -                                         | -                     |                                |                                         | -                                  | --                                      | -                                    | -                                 |

Levels of Significance

P < .05 +

P < .01 ++

Footnote 1 - The organized environment and setting limits parent-child rating is omitted from this cluster because they did not correlate significantly with any of the child indices.



Figure 6

Showing Intercorrelation of Child Indices and Parent-Child Ratings at Five MonthsPARENT-CHILD RATINGS

| <u>CHILD INDICES</u>        | <u>VII</u><br>Clarity of<br>Communication | <u>I</u><br>Affection | <u>II</u><br>Time<br>Available | <u>IV</u><br>Clarity of<br>Availability | <u>X</u><br>Conceptual<br>Exchange | <u>IX</u><br>Move to New<br>Experiences | <u>VI-e</u><br>Academic<br>Standards | <u>VIII</u><br>Active<br>Instruc. |
|-----------------------------|-------------------------------------------|-----------------------|--------------------------------|-----------------------------------------|------------------------------------|-----------------------------------------|--------------------------------------|-----------------------------------|
| Adaptation                  | +                                         | ++                    | ++                             | ++                                      |                                    |                                         | +                                    |                                   |
| Psychological<br>Move       | +                                         |                       | +                              | +                                       |                                    | +                                       | ++                                   |                                   |
| Modulation<br>of Aggression |                                           | ++                    | +                              | +                                       |                                    |                                         |                                      |                                   |
| Task Orientation            |                                           | +                     | +                              | ++                                      | ++                                 |                                         | ++                                   | ++                                |
| Stanford-Binet I.Q.         | ++                                        | +                     | +                              | +                                       |                                    | ++                                      | +                                    |                                   |
| Disruption of<br>Group      | -                                         | --                    | --                             | --                                      | -                                  | --                                      | -                                    | -                                 |

Levels of Significance

 $P < .05$  ± $P < .01$  ++

Footnote 1 -

The organized environment and setting limits parent-child rating is omitted from this cluster, because they did not correlate significantly with any of the child indices.

Figure 7

Showing Intercorrelation of Change in Child Indices and Change in Parent-Child Ratings

PARENT-CHILD RATINGS

| CHILD INDICES               | VII<br>Clarity of<br>Communication | I<br>Affection | II<br>Time<br>Available | IV<br>Clarity of<br>Availability | X<br>Conceptual<br>Exchange | IX<br>Move to New<br>Experiences | VI-e<br>Academic<br>Standards | VIII<br>Active<br>Instruc. |
|-----------------------------|------------------------------------|----------------|-------------------------|----------------------------------|-----------------------------|----------------------------------|-------------------------------|----------------------------|
| Adaptation                  |                                    |                | ++                      | ++                               | +                           | +                                |                               |                            |
| Psychological<br>Move       | +                                  | +              | ++                      |                                  | +                           | +                                |                               |                            |
| Modulation<br>of Aggression |                                    | +              | +                       | ++                               |                             | +                                |                               |                            |
| Task Orientation            |                                    |                |                         | +                                |                             |                                  |                               |                            |
| Stanford-Ninet I.Q.         |                                    |                |                         | +                                |                             |                                  |                               | +                          |
| Disruption of<br>Group      |                                    |                |                         | --                               |                             |                                  |                               |                            |

Levels of Significance

P < .05 ++  
P < .01 ++

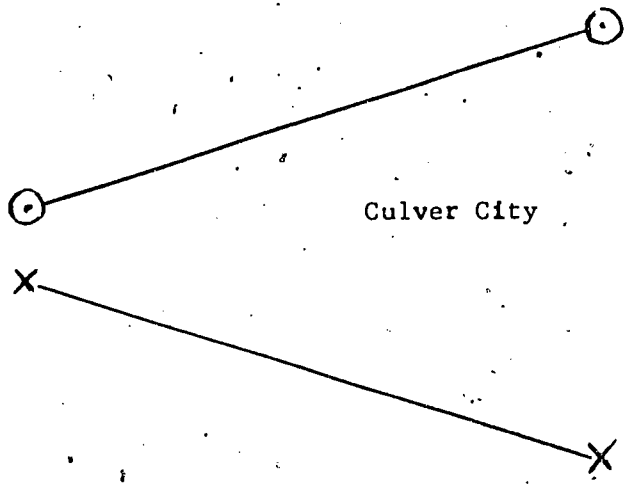
Footnote 1 - The organized environment and setting limits parent-child rating is omitted from this cluster because they did not correlate significantly with any of the child indices.

FIGURE 8

Showing Average Stanford Binet Scores At  
6 Weeks and Beginning of Kindergarten

119  
118  
117  
116  
115  
114  
113  
112  
111  
110  
109  
108  
107  
106

I.Q.  
core



Culver City

San Pablo

6 Weeks After Entry

Beginning of Kindergarten

Point of Assessment

TABLE 1

Showing Reliability Intercorrelations of Parent-Child Ratings:Social Worker vs. Observer

N = 25

|                               | <u>After<br/>Six<br/>Weeks</u> | <u>After<br/>Five<br/>Months</u> |
|-------------------------------|--------------------------------|----------------------------------|
| I. Affection                  | .81**                          | .67**                            |
| II. Time Available            | .67**                          | .88**                            |
| III. Organized Environment    | .89**                          | .87**                            |
| IV. Clarity-Availability      | .52**                          | .86**                            |
| V. Limit Setting              | .58**                          | .79**                            |
| VI-a. Aggression Control      | .77**                          | .48**                            |
| VI-b. Cleanliness             | .64**                          | .33                              |
| VI-c. Self Reliance           | .82**                          | .43                              |
| VI-d. Adult Role Behavior     | .44*                           | .44                              |
| VI-e. Academic Achievement    | .74**                          | .74**                            |
| VII. Clarity of Communication | .68**                          | .80**                            |
| VIII. Active Instruction      | .81**                          | .78**                            |
| IX. Move to New Experiences   | .14                            | .69**                            |
| X. Conceptual Exchange        | .73**                          | .83**                            |
| Global Parent Change Rating   | --                             | .50**                            |
| Global Person Change Rating   | --                             | .88**                            |

Levels of Significance: \*  $P \leq .05$ ; \*\*  $P \leq .01$

TABLE 2

Showing Average Stanford-Binet I.Q. Scores for Entry and 6-Week Point

N = 10

| <u>DAY CARE CENTER</u> | <u>AVERAGE I.Q.</u> |                  |
|------------------------|---------------------|------------------|
|                        | <u>Entry</u>        | <u>Six Weeks</u> |
| 1<br>Culver City       | 109                 | 117              |
| 2<br>San Pablo         | 108                 | 117              |

- 1 Applying the Wilcoxon Matched Paired Sign Test of Significance (two tailed), the difference between Entry and Six Weeks is statistically significant between the .02 and .05 probability level.
- 2 Applying the Wilcoxon Matched Paired Sign Test of Significance (two tailed), the difference between Entry and Six Weeks is statistically significant at the .01 probability level.

TABLE 3

Showing Intercorrelation of Child Indices at Six Weeks N=25

| CHILD INDICES                   | 1 | 2     | 3     | 4     | 5     | 6    | 7     | 8      | 9    | 10    | 11     | 12    | 13   | 14    |
|---------------------------------|---|-------|-------|-------|-------|------|-------|--------|------|-------|--------|-------|------|-------|
| 1. General Adapt.               |   | .79** | .76** | .79** | .71** | .24  | .45*  | -.48*  | -.07 | -.03  | -.53** | .14   | -.06 | -.24  |
| 2. Psychological Move           |   |       | .61** | .57** | .50** | -.00 | .23   | -.39*  | .09  | -.16  | -.47*  | .24   | -.22 | -.28  |
| 3. Peer Relations               |   |       |       | .59** | .57** | .04  | .38*  | -.64** | -.05 | -.32* | -.44*  | .28   | -.10 | -.53* |
| 4. Modulation of Aggression     |   |       |       |       | .43*  | .01  | .10   | -.28   | -.15 | -.09  | -.36*  | -.02  | .03  | -.19  |
| 5. Task Orientation Rtg.        |   |       |       |       |       | .37* | .62** | -.72** | .07  | -.41* | -.76** | .26   | -.09 | -.36* |
| 6. Stanford Binet I.Q. (Entry)  |   |       |       |       |       |      | .90** | -.29   | .06  | -.03  | -.37*  | -.03  | .33  | -.14  |
| 7. Stanford Binet I.Q. (6-Week) |   |       |       |       |       |      |       | -.54** | -.09 | -.32  | -.54*  | .18   | .14  | -.18  |
| 8. Disengages from Task         |   |       |       |       |       |      |       |        | -.05 | .52** | .73**  | -.26  | .01  | .67** |
| 9. Shows Interest               |   |       |       |       |       |      |       |        |      | .43*  | .10    | .55** | .26  | -.06  |
| 10. Seeks Affection             |   |       |       |       |       |      |       |        |      |       | .58*   | .23   | .26  | .14   |
| 11. Disrupts Task               |   |       |       |       |       |      |       |        |      |       |        | .10   | .21  | .50*  |
| 12. Productive                  |   |       |       |       |       |      |       |        |      |       |        |       | .26  | -.22  |
| 13. Seeks Lap                   |   |       |       |       |       |      |       |        |      |       |        |       |      | .00   |
| 14. Regresses                   |   |       |       |       |       |      |       |        |      |       |        |       |      |       |

Levels of Significance: \*  $P < .05$ ; \*\*  $P < .01$ .

TABLE 4

Showing Intercorrelation of Child Indices at Five Months N = 25

| CHILD INDICES                    | 1 | 2     | 3     | 4     | 5     | 6     | 7      | 8    | 9    | 10     | 11    | 12   | 13    |
|----------------------------------|---|-------|-------|-------|-------|-------|--------|------|------|--------|-------|------|-------|
| 1. General Adapt.                |   | .87** | .74** | .71** | .78** | .49** | -.32** | .27  | .06  | -.49** | .31   | .18  | -.32  |
| 2. Psychological Move            |   |       | .78** | .59** | .71** | .44** | -.39** | .36* | -.02 | -.44*  | .43*  | .09  | -.46* |
| 3. Peer Relations                |   |       |       | .83** | .55** | .36*  | -.31   | .20  | -.12 | -.39*  | .30   | -.04 | -.26  |
| 4. Modulation of Aggression      |   |       |       |       | .45*  | .22   | -.22   | .18  | -.02 | -.54** | .24   | .11  | -.15  |
| 5. Task Orientation Rtg.         |   |       |       |       |       | .27   | -.50** | .41* | -.17 | -.44*  | .46*  | .17  | -.12  |
| 6. Stanford-Binet I.Q. (5-Month) |   |       |       |       |       |       | -.40*  | -.30 | .11  | -.33   | -.23  | .14  | .03   |
| 7. Disengages from Task          |   |       |       |       |       |       |        | -.13 | .29  | .59**  | -.22  | -.28 | -.16  |
| 8. Shows Interest                |   |       |       |       |       |       |        |      | -.05 | -.04** | .79** | -.21 | -.13  |
| 9. Seeks Affection               |   |       |       |       |       |       |        |      |      | .17    | -.04  | .14  | .18   |
| 10. Disrupts Task                |   |       |       |       |       |       |        |      |      |        | -.03  | -.31 | .08   |
| 11. Productive                   |   |       |       |       |       |       |        |      |      |        |       | -.17 | -.02  |
| 12. Seeks Lap                    |   |       |       |       |       |       |        |      |      |        |       |      | .06   |
| 13. Regresses                    |   |       |       |       |       |       |        |      |      |        |       |      |       |

Levels of Significance: \*  $P < .05$ ; \*\*  $P < .01$ .

TABLE 5

Showing Interrelation of Change Scores for Child IndicesSix Weeks to Five Months N = 25

| CHILD INDICES               | 1 | 2     | 3     | 4    | 5     | 6     | 7    | 8    | 9    | 10     | 11    | 12   | 13    |
|-----------------------------|---|-------|-------|------|-------|-------|------|------|------|--------|-------|------|-------|
| 1. General Adaptation       |   | .67** | .65** | .35* | .59** | .54** | -.12 | .17  | -.01 | -.54** | -.21  | .06  | -.21  |
| 2. Psychological Move       |   |       | .31   | .07  | .11   | .38*  | .14  | -.03 | -.08 | -.27   | -.20  | .06  | -.13  |
| 3. Peer Relations           |   |       |       | .04  | .50** | .46*  | -.21 | .16  | -.05 | -.26   | -.03  | .04  | -.22  |
| 4. Modulation of Aggression |   |       |       |      | .20   | -.07  | .21  | .23  | .18  | -.47*  | -.21  | .36* | -.01  |
| 5. Task Orientation Rtg.    |   |       |       |      |       | .43*  | -.25 | .32  | -.14 | -.36*  | .26   | .06  | -.27  |
| 6. Stanford Binet I.Q.      |   |       |       |      |       |       | -.15 | .13  | -.02 | -.41*  | .09   | -.01 | -.41* |
| 7. Disengages from Task     |   |       |       |      |       |       |      | .01  | -.11 | .44*   | .07   | .02  | .39*  |
| 8. Shows Interest           |   |       |       |      |       |       |      |      | .17  | -.07   | .66** | .32  | .08   |
| 9. Seeks Affection          |   |       |       |      |       |       |      |      |      | -.20   | -.04  | .15  | -.22  |
| 10. Disrupts Task           |   |       |       |      |       |       |      |      |      |        | .12   | .05  | .64** |
| 11. Productive              |   |       |       |      |       |       |      |      |      |        |       | .03  | -.01  |
| 12. Seeks Lap               |   |       |       |      |       |       |      |      |      |        |       |      | .14   |
| 13. Regresses               |   |       |       |      |       |       |      |      |      |        |       |      |       |

Levels of Significance: \*  $P < .05$ ; \*\*  $P < .01$ .



TABLE 6

Showing Intercorrelation of Parent-Child Ratings at Six Weeks

N = 25

|                               | I | II    | III   | IV    | V     | VI-a  | VI-b  | VI-c  | VI-d | VI-e  | VII   | VIII  | IX    | X     |
|-------------------------------|---|-------|-------|-------|-------|-------|-------|-------|------|-------|-------|-------|-------|-------|
| I. Affection                  |   | .83** | .45*  | .78** | .44*  | -.11  | .22   | -.06  | -.04 | .39*  | .84** | .71** | .60** | .67** |
| II. Time Available            |   |       | .67** | .92** | .56** | .18   | .53** | .12   | .15  | .40*  | .89** | .82** | .62** | .86** |
| III. Organized Environment    |   |       |       | .67** | .82** | .50** | .58** | .43*  | .38* | .46*  | .62** | .68** | .43*  | .73** |
| IV. Clarity-Availability      |   |       |       | .69** | .69** | .31   | .57** | .23   | .19  | .42*  | .81** | .81** | .54** | .86** |
| V. Limit Setting              |   |       |       |       | .51** | .49*  | .49*  | .33   | .37* | .36*  | .57** | .69** | .31   | .67** |
| VI-a. Aggression Control      |   |       |       |       |       | .74** | .56** | .59** | .19  | .18   | .33   | .33   | .01   | .30   |
| VI-b. Cleanliness             |   |       |       |       |       |       | .46*  | .45*  | .35* | .52** | .59** | .59** | .45*  | .52** |
| VI-c. Self Reliance           |   |       |       |       |       |       |       | .79** | .46* | .23   | .28   | .28   | .28   | .29   |
| VI-d. Adult Role Behavior     |   |       |       |       |       |       |       |       | .44* | .30   | .40*  | .40*  | .37*  | .34*  |
| VI-e. Academic Achievement    |   |       |       |       |       |       |       |       |      | .55** | .67** | .67** | .80** | .60** |
| VII. Clarity of Communication |   |       |       |       |       |       |       |       |      |       | .89** | .89** | .77** | .85** |
| VIII. Active Instruction      |   |       |       |       |       |       |       |       |      |       |       |       | .78** | .94** |
| IX. Move to New Experiences   |   |       |       |       |       |       |       |       |      |       |       |       |       | .71** |
| X. Conceptual Exchange        |   |       |       |       |       |       |       |       |      |       |       |       |       |       |

Levels of Significance: \*  $P < .05$ ; \*\*  $P < .01$ .

TABLE 7

Showing Intercorrelation of Parent-Child Ratings at Five Months

N = 25

|                               | I | II    | III   | IV    | V     | VI-a  | VI-b  | VI-c | VI-d  | VI-e  | VII   | VIII  | IX    | X     |
|-------------------------------|---|-------|-------|-------|-------|-------|-------|------|-------|-------|-------|-------|-------|-------|
| I. Affection                  |   | .85** | .44*  | .82** | .44*  | .02   | .21   | -.04 | .36*  | .44*  | .83** | .61** | .52** | .72** |
| II. Time Available            |   |       | .52** | .95** | .53** | .22   | .36*  | -.00 | .34*  | .39*  | .84** | .63** | .43*  | .70** |
| III. Organized Environment    |   |       |       | .52** | .82** | .50** | .46*  | .37* | .26   | .31   | .64** | .56** | .22   | .50** |
| IV. Clarity-Availability      |   |       |       |       | .55** | .23   | .35*  | .05  | .38*  | .39*  | .79** | .64** | .32   | .64** |
| V. Limit Setting              |   |       |       |       |       | .63** | .36*  | .43* | .33   | .47*  | .72** | .79** | .36*  | .70** |
| VI-a. Aggression Control      |   |       |       |       |       |       | .65** | .38* | .02   | .30   | .29   | .49*  | .05   | .35*  |
| VI-b. Cleanliness             |   |       |       |       |       |       |       | -.12 | -.14, | -.02  | .20   | .21   | -.18  | .20   |
| VI-c. Self Reliance           |   |       |       |       |       |       |       |      | .38*  | .47*  | .29   | .39*  | .41*  | .28   |
| VI-d. Adult Role Behavior     |   |       |       |       |       |       |       |      |       | .51** | .41*  | .36*  | .41*  | .36*  |
| VI-e. Academic Achievement    |   |       |       |       |       |       |       |      |       |       | .58** | .65** | .76** | .73** |
| VII. Clarity of Communication |   |       |       |       |       |       |       |      |       |       |       | .82** | .66** | .86** |
| VIII. Active Instruction      |   |       |       |       |       |       |       |      |       |       |       |       | .62** | .90** |
| IX. Move to New Experiences   |   |       |       |       |       |       |       |      |       |       |       |       |       | .79** |
| X. Conceptual Exchange        |   |       |       |       |       |       |       |      |       |       |       |       |       |       |

Levels of Significance: \*  $P < .05$ ; \*\*  $P < .01$

TABLE 8

Showing Intercorrelation of Parent-Child Rating Changes from Six Weeks to Five Months

N = 25

|                               | I | II    | III   | IV    | V   | VI-a  | VI-b  | VI-c | VI-d  | VI-e | VII   | VIII  | IX    | X     |
|-------------------------------|---|-------|-------|-------|-----|-------|-------|------|-------|------|-------|-------|-------|-------|
| I. Affection                  |   | .60** | .09   | .51** | .18 | .04   | -.12  | -.30 | .13   | .33  | .35*  | .14   | .19   | .46*  |
| II. Time Available            |   |       | .51** | .74** | .16 | -.29  | -.21  | -.30 | .16   | .30  | .52** | .38*  | .49** | .75** |
| III. Organized Environment    |   |       |       | .29   | .10 | -.06  | -.04  | -.07 | -.06  | -.04 | .40*  | .15   | .42*  | .46*  |
| IV. Clarity-Availability      |   |       |       |       | .28 | -.42* | -.32  | -.20 | .28   | .36* | .40*  | .44*  | .35*  | .68** |
| V. Limit Setting              |   |       |       |       |     | .03   | .34*  | -.27 | -.39* | -.19 | .15   | .22   | .02   | .43*  |
| VI-a. Aggression Control      |   |       |       |       |     |       | .60** | .19  | -.35* | -.08 | .11   | -.16  | -.14  | .20   |
| VI-b. Cleanliness             |   |       |       |       |     |       |       | .42* | -.21  | -.10 | -.21  | -.18  | -.08  | -.22  |
| VI-c. Self Reliance           |   |       |       |       |     |       |       |      | .23   | .01  | .04   | -.21  | .19   | -.15  |
| VI-d. Adult Role Behavior     |   |       |       |       |     |       |       |      |       | .36* | .36*  | .17   | .34*  | .10   |
| VI-e. Academic Achievement    |   |       |       |       |     |       |       |      |       |      | .05   | .00   | .27   | .34*  |
| VII. Clarity of Communication |   |       |       |       |     |       |       |      |       |      |       | .59** | .67** | .43*  |
| VIII. Active Instruction      |   |       |       |       |     |       |       |      |       |      |       |       | .28   | .30   |
| IX. Move to New Experiences   |   |       |       |       |     |       |       |      |       |      |       |       |       | .51** |
| X. Conceptual Exchange        |   |       |       |       |     |       |       |      |       |      |       |       |       |       |

Levels of Significance: \*  $P < .05$ ; \*\*  $P < .01$ .

TABLE 8-a

ving Interrelation of Specific Parent-Child and Global Person and Global Parent Ratings

N = 25

|                               | <u>Global<br/>Person</u> | <u>Global<br/>Parent</u> |
|-------------------------------|--------------------------|--------------------------|
| I. Affection                  | .46 <sup>*</sup>         | .44 <sup>*</sup>         |
| II. Time Available            | .51 <sup>**</sup>        | .67 <sup>**</sup>        |
| III. Organized Environment    | .51 <sup>**</sup>        | .55 <sup>**</sup>        |
| IV. Clarity-Availability      | .14                      | .66 <sup>**</sup>        |
| V. Limit Setting              | .10                      | .37 <sup>*</sup>         |
| VI-a. Aggression Control      | .05                      | -.15                     |
| VI-b. Cleanliness             | -.03                     | -.21                     |
| VI-c. Self Reliance           | -.08                     | -.22                     |
| VI-d. Adult Role Behavior     | .10                      | .19                      |
| VI-e. Academic Achievement    | .05                      | .04                      |
| VII. Clarity of Communication | .21                      | .52 <sup>**</sup>        |
| VIII. Active Instruction      | -.06                     | .49 <sup>**</sup>        |
| IX. Move to New Experiences   | .18                      | .48 <sup>**</sup>        |
| X. Conceptual Exchange        | .53                      | .73 <sup>**</sup>        |
| Global Parent                 | .59 <sup>**</sup>        | ---                      |

Levels of Significance: \*  $P < .05$ ; \*\*  $P < .01$ .

Table 9

Showing those parent-child changes from 6 weeks to 5 months  
which are most highly intercorrelated

|               | 1     | 2     | 3     | 4     | 5     | 6   | 7   |
|---------------|-------|-------|-------|-------|-------|-----|-----|
| Global/Parent | ---   |       |       |       |       |     |     |
| Change Rating |       |       |       |       |       |     |     |
| Time Parent   | .67** | ---   |       |       |       |     |     |
| Available*    |       |       |       |       |       |     |     |
| Clarity of    | .66** | .74** | ---   |       |       |     |     |
| Availability  |       |       |       |       |       |     |     |
| Clarity of    | .52** | .52** | .40*  | ---   |       |     |     |
| Communication |       |       |       |       |       |     |     |
| Conceptual    | .73** | .75** | .68** | .43*  | ---   |     |     |
| Exchange      |       |       |       |       |       |     |     |
| Move to New   | .48** | .49** | .35*  | .67** | .51** | --- |     |
| Experience    |       |       |       |       |       |     |     |
| Active        | .49** | .38*  | .44*  | .59** | .43*  | .28 | --- |
| Instruction   |       |       |       |       |       |     |     |

Levels of Significance: \*  $P < .05$ ; \*\*  $P < .01$ .

TABLE 10 .

Showing Average Stanford Binet I.Q. Scores  
for Six Weeks, Five Months, and Twelve Months

N = 11

| <u>DAY CARE CENTER</u> | <u>Six Weeks</u> | <u>Five Months</u> <sup>1</sup> | <u>Twelve Months</u> <sup>2</sup> |
|------------------------|------------------|---------------------------------|-----------------------------------|
| Culver City            | 115              | 119                             | 119                               |
| San Pablo              | 115              | 111                             | 110                               |

1  
The t (separate) for comparison of the mean difference (5-months minus 6 weeks) of the Culver City versus San Pablo samples is 3.05 with 19.1 d. f. and .001 < P < .01.

2  
The t (separate) for comparison of the mean difference (12-months minus 6 weeks) of the Culver City versus San Pablo samples is 2.74 with 19.8 d. f. and .01 < P < .02.

TABLE 11

Showing Average Stanford Binet I.Q. at Six Weeks and Beginning Kindergarten  
and whether Child in Program Less or More than a Year

N = 25

LENGTH OF TIME IN  
PROGRAM & DAY CARE CENTER

|                                            | (A)<br><u>Six Weeks</u> | (B)<br><u>Beginning Kindergarten</u> | Difference<br><u>(B - A)</u> |
|--------------------------------------------|-------------------------|--------------------------------------|------------------------------|
| <u>Less Than Year</u>                      |                         |                                      |                              |
| Culver City                                | 115                     | 118                                  | 3                            |
| San Pablo                                  | 113                     | 110                                  | -3                           |
| <sup>1</sup><br><u>More Than Year</u>      |                         |                                      |                              |
| Culver City                                | 114                     | 118                                  | 4                            |
| San Pablo                                  | 117                     | 111                                  | -6                           |
| <sup>2</sup><br><u>All Center Children</u> |                         |                                      |                              |
| Culver City                                | 115                     | 118                                  | 3                            |
| San Pablo                                  | 114                     | 111                                  | -3                           |

The t (separate) test for the 2-tailed comparison (More Than Year) between Culver City and San Pablo on the difference between the I.Q. at Beginning Kindergarten and 6 Weeks is 3.27, a difference that is statistically significant between the .01 and .02 probability levels.

The t (separate) test for the 2-tailed comparison (All Center Children) between Culver City and San Pablo on the difference between the I.Q. at Beginning Kindergarten and 6 Weeks is 2.67, a difference that is statistically significant between the .01 and .02 probability levels.

## APPENDIX A

### MANUAL DEFINING

#### RATINGS SUMMARIZING CERTAIN ASPECTS OF

#### THE CHILD'S DEVELOPMENT IN DAY CARE

Instructions to Rater: Carefully read the period analysis and the task orientation observations on the child to be rated. Confine yourself to the time span being considered; e.g., ratings made five months after entry take the first five months into account. Think of the categories as arranged along a dimension from adequate to less adequate development. Place each child in one of the 7 categories.

The ratings are not absolute but relative to the total group of children being studied and the child's own potential development.

I. The nature of the child's psychological move from the parents to a new involvement in the nursery school. This rating is relevant to the concept of individuation-separation. It is most likely to be seen in that part of the period analysis dealing with the daily entrance into the Center. The defined points are:

7. The child experiences feeling that he (or she) is cared for by his parents, can return for refueling, but limits latter to initial period of nursery school entry. The child forms or rather experiences a new and additional home base in relation to the teachers and this is gradually diminished in importance as he moves toward task and peer involvement.
6. -----
5. -----
4. The child experiences feeling that he is cared for, but this is threatened by some maternal ambivalence or other maternal or family fluctuations. He can eventually trust the total school as a home base, but only after a period of anxiety and reaching out for the previous main caretaker.
3. -----
2. -----
1. The child experiences great uncertainty in his home base and this is associated with difficulty in establishing trust in either a teacher or the school.

II. The nature of the child's peer relations. This is best defined by the Anna Freud Developmental Line relating to peer relations. The defined points are:

7. The child makes purposeful positive contacts, resorts to periods of defensive testing, but these lead ultimately to peer involvement, mutuality, assertiveness and even peer leadership.



6. -----

5. -----

4. Purposeful positive contacts are made and persisted in, but they alternate with periods of withdrawal and passivity and the ultimate mutuality is limited.

3. -----

2. -----

1. The contacts attempted by the child are predominantly of a negative, provocative sort and/or the child remains isolated from peers.

III. The nature of the child's task orientation. This is defined in many places but emphasized here is the involvement in both self-selected and group structured tasks. The defined ratings are:

7. The child moves from and adds to self-selected activities -- e.g., tricycle, blocks, doll corner -- increasing engagement and persistence in these and then engagement in and contribution to tasks structured by teacher.

6. -----

5. -----

4. The child's involvement in self-selected tasks is considerable, but largely dependent on adult approval and/or somewhat isolated. By the end of the five month period he can engage in structured group activities even though he makes very few positive contributions.

3. -----

2. -----

1. The child is involved in self-selected activities, shows some persistence, but is limited in variety and dependent on external approval. Initial engagement in structured group activity is followed by disruption of the group.

IV. The nature of the child's modulation of aggression. Are the verbal assertive derivatives developed or is the picture one of extremes of aggressive outbursts or the repression of aggressive affects? The defined ratings are:

7. Aggression well modulated: Neither excessively expressed or inhibited. Appropriate assertiveness and socially appropriate inhibition is present. Next to no evidence of need for conflict resolution related to aggressive derivatives.

6. -----

5. -----

4. Aggressiveness modulated in context of considerable inhibition, occasional provocation, and/or turning of aggression inward. There are infrequent outbursts, no striking masochism, but assertiveness is limited.

3. -----

2. -----

1. Aggression expressed in direct, severe and provocative form. Reaction of environment has masochistic consequences for the child as have other actions, such as falling down and hurting himself. Aggression may also be completely inhibited or there is an extreme fluctuation between outburst and inhibition.

V. The nature of the child's general adaptation. Considering all aspects of the child's development what is the balance of progressive over regressive trends. Include specifically how this relates to the child's adaptation in the Center and the home.

7. The progressive over regressive trends are consistent with the potential of the child and what one would expect at this age level.

6. -----

5. -----

4. The progressive trends outweigh regressive ones but are not consistent with the potential and age level of the child.

3. -----

2. -----

1. The regressive trends and associated arrests and fixation points outweigh progressive trends.

APPENDIX B

MANUAL DEFINING

PARENT-CHILD RATINGS

- I. The quality and quantity of the parent's affection for and liking for his child. Warmth has also been used to refer to this dimension. It involves the love and compassion for the child as expressed in a variety of ways.
- (7) Parent has and shows intense affection and liking for child.
  - (6)
  - (5)
  - (4) Parent has and shows moderate liking and affection for child; no signs of rejection.
  - (3)
  - (2)
  - (1) Parent has little basic liking for child; indications of rejection are evident.
- II. The extent of time and energy that the parent has available for his child. Although related to affection and liking, it is important to describe just how often the parent is affectionate and available.
- (7) Parent is psychologically available to the child a great deal of the time; e.g., 4 - 6 hours.
  - (6)
  - (5)
  - (4) Parent is psychologically available for a moderate amount of time; e.g., 1 - 2 hours.
  - (3)
  - (2)
  - (1) Parent is hardly ever psychologically available to the child for any length of time.

III. The parent's capacity to maintain an organized and environmental sequence. Even if affectionate and capable of setting limits, can the parent organize an effective set of routines to which the child can adapt?

- (7) Parent has developed an organized sequence for child without being extremely rigid.
- (6)
- (5)
- (4) Parent has developed moderate amount of organization in regard to meals, sleep, etc.
- (3)
- (2)
- (1) Parent has developed next to no organized routine in even such matters as mealtime and sleep.

IV. The clarity with which the parent defines his availability. The parent may be affectionate and spend considerable time with the child, but the child is often uncertain as to just when he can expect the parent to be available.

- (7) Parent has given child very clear concept of when to expect him or her. The availability can be counted on.
- (6)
- (5)
- (4) Parent has given child moderate certainty as to when he or she is available.
- (3)
- (2)
- (1) Parent has given child little certainty as to when he or she is available.

V. The extent and consistency of the limits set by the parent. Can the parent confront the child's challenge of power and manipulation in order to insure consistent directives?

- (7) Parent consistently follows through on the limits set. Consistency rather than the number of limits should be judged.
- (6)
- (5)
- (4) Parent is moderately consistent; there are several instances of a lack of follow through.
- (3)
- (2)
- (1) Parent tends to be very inconsistent; sometimes following through and sometimes not, or never following through at all.

VI. The standards set and the sanctions used by the parents in regard to the areas listed below. It is important to recognize that certain sanctions work best for a given child. Where the parent expects greatest compliance with standards, these sanctions will be used with insistence. Make a rating for each area.

- a) Aggression control
  - b) Cleanliness
  - c) Self-reliance
  - d) Adult role behavior
  - e) Achievement in preacademic areas
- (7) Standards set are high and strong sanctions are used to enforce standards.
  - (6)
  - (5)
  - (4) The combination of standards and sanctions used are moderate.
  - (3)
  - (2)
  - (1) The total impact of standards and sanctions used is minimal. The parents exercise little control in this area.

VII. The extent of clarity in parent-child communication. To what extent does the parent use reason to persuade, encourage verbal give-and-take and, in general, openly confront issues?

(7) The clarity of communication between parent and child is high. That communication may involve verbal expression but need not be confined to that mode.

(6)

(5)

(4) There is a moderate amount of communication around issues involving parent and child.

(3)

(2)

(1) There is little clear communication around issues of importance to parent and child. The child feels he or she can't make herself or himself understood.

VIII. The extent of the parent's active instruction. How effectively does the parent instruct the child in large motor skills, in fine perceptuo-motor skills, and in conceptual distinctions such as word meaning and naming of objects?

(7) The parent engages in much instruction of the child and is definitely oriented to having the child learn.

(6)

(5)

(4) There is a moderate amount of instruction.

(3)

(2)

(1) The parent engages in next to no explicit instructions even though they may value such instruction.

IX. The manner and extent to which the parent encourages the child to move toward new experiences and relationships. Does the parent provide the type of support and planning that is likely to lead to a sense of pleasure and competence in the new experiences? Does the parent give the psychological permission to move out from herself or himself? Or are there signs that communicate that the child must remain as psychologically close as previously and nothing should change?

- (7) Parent encourages new experiences through helpful planning and does not insist on the maintenance of the previously existing psychological interrelationships.
- (6)
- (5)
- (4) Parent encourages some new experiences but in other instances either through inadequate planning or maintenance of the previously existing relationships, does not permit new experiences.
- (3)
- (2)
- (1) Parent seldom encourages new experiences in relationships. No adequate planning and/or keeps the child in previous relationship.

X. The frequency with which the parent is involved in a conceptual exchange with the child. How often does the parent read to the child, tell him a story, and talk to him in the sense of giving and seeking information?

- (7) Parent talks to the child a great deal in the sense of giving and seeking information and/or reads a great deal to the child.
- (6)
- (5)
- (4) Parent sometimes talks to and/or reads to child in information-concept areas.
- (3)
- (2)
- (1) Parent seldom has conceptual exchanges and/or periods of reading. It is quite possible that effective communication nevertheless occurs.

## APPENDIX C

### MANUAL DEFINING

#### TEACHER RATINGS OF KINDERGARTEN AND ELEMENTARY SCHOOL CHILDREN

##### I. Nature of the child's move into the classroom.

This is most likely to be seen at the daily entrance into the classroom but may be revealed at other points during the day.

- (7) The child moves easily into the classroom setting, showing no anxiety leaving the parents or entering a new situation.

(6)

(5)

- (4) The child feels comfortable in school and with the teacher for the most part although occasional signs of longing for the parent have been evident.

(3)

(2)

- (1) The child has great difficulty in being away from "home base" and does not trust the teacher or school to provide him with a feeling of security and comfort in place of the parental home and contacts.

##### II. The degree of the child's contact with other children.

- (7) Given the opportunity, he is almost always doing something with other children.

(6)

(5)

- (4) There is an average amount of contact with other children while at other times he will do things by himself and/or try and relate to the teacher.

(3)

(2)

- (1) He is rarely, if ever, doing something with other children and is usually isolated and self-preoccupied or constantly with the teacher.



III. The positive/negative emotional nature of the child's contacts with other children.

- (7) Almost always positive, friendly, warm, happy, comfortable.
- (6)
- (5)
- (4) Contacts will fluctuate so that there will be approximately equal amounts of positive as well as negative contacts.
- (3)
- (2)
- (1) Usually negative, aggressive, cold, hostile, unfriendly.

IV. Degree of child's emotional involvement with other children.

Here we are concerned with the intensity of the child's feelings expressed towards his peers (be these feelings positive or negative) and his emotional involvement with them.

- (7) Very strong and extremely emotionally involved.
- (6)
- (5)
- (4) Feelings expressed towards peers are of moderate intensity and degree of emotional involvement with peers is average.
- (3)
- (2)
- (1) There is but a minimal amount of emotional involvement with the other children. Even though they may be playing together, their emotional involvement has a flat quality as if the contact is of little importance to them.

V. Cooperation, leadership and following behavior.

This refers to the kind of play/behavior that the child engages in with his peers.

- (7) Play with peers is a sharing experience in which the child contributes ideas and leads assertively but can also be an appropriate follower and let another child take charge.
- (6)
- (5)
- (4) There is an average amount of vacillation between the "mature" kind of attitude reflected in #7 and the quality described under #1.
- (3)
- (2)
- (1) Play with peers is almost always either (2) as a follower, and never "taking charge" himself or (b) almost always as the leader in terms of not being willing to relinquish power and leadership to others (if you score 4, 3, 2 or 1 also indicate whether the (a) all follower, or (b) all leader quality is applicable).

VI. Extent to which child works well on projects by himself which he has initiated:  
(includes play, academic work, etc. could be almost any kind of "project".)

(a) Creativity

- (7) Highly creative, thinks of new things on own, takes things he's learned and adds his own creative variations.
- (6)
- (5)
- (4) Is often moderately creative, tends to rely on ideas garnered from teachers and peers (in addition to repeating activities of teachers and peers in order to master them.)
- (3)
- (2)
- (1) Plays and works unimaginatively, (e.g. only copies productions of other children or duplicates things shown by teacher -- even once he has learned how to do whatever it is he is imitating).

(b) Attention span and involvement

- (7) Concentrates totally on tasks for as long as is necessary to complete.
- (6)
- (5)
- (4) Moderate attention span and involvement.
- (3)
- (2)
- (1) Never stays with anything for more than a few moments and doesn't seem involved even when he is working on something.

(c) Quality of production (when applicable)

- (7) Extremely good, significantly above level one would expect at that age.
- (6)
- (5)
- (4) Moderately good -- at age and grade level expectancy.
- (3)
- (2)
- (1) Extremely poor (note: can occur even with high creativity and good attention span involvement) -- substantially below age and grade level expectancy.

VII. Extent to which child works well on projects by himself which teacher has initiated.

(a) Ability to follow instructions

- (7) Always does just as is told.
- (6)
- (5)
- (4) Does as is told about 1/2 the time.
- (3)
- (2)
- (1) Doesn't follow directions.

(b) Attention span and involvement

- (7) Concentrates totally on tasks for as long as is necessary to complete.
- (6)
- (5)
- (4) Moderate attention span and involvement.
- (3)
- (2)
- (1) Never stays with anything for more than a few moments and doesn't seem involved even when he is working on something.

(c) Quality of productions

- (7) Extremely good, significantly above level one would expect at that age.
- (6)
- (5)
- (4) Moderately good -- at age and grade level expectancy.
- (3)
- (2)
- (1) Extremely poor (note: can occur even with high creativity and good attention span involvement) -- substantially below age and grade level expectancy.

(d) When creativity is appropriate within the context of following directions:

(7) Adds own creative touches.

(6)

(5)

(4) Is modestly creative with guidelines set by teacher.

(3)

(2)

(1) Does just as is told and does not deviate in any way or add anything of own.

VIII. How does the child deal with his aggression.

(7) Aggression is under appropriate control in that it is not excessively expressed or inhibited. There is appropriate assertiveness and socially appropriate inhibition.

(6)

(5)

(4) There are few aggressive outbursts, however, assertiveness is limited.

(3)

(2)

(1) Aggression is expressed in direct, severe and provocative form. Can be seen in terms of direct physical or verbal attacks on other children and/or a tendency for the child to direct his aggression towards himself (e.g. falling and hurting himself frequently or making frequent and severe self-deprecatory remarks.)

IX. Behavior

- (7) Always listens, is never a behavior problem, does as is told and does not "act up".
- (6)
- (5)
- (4) Fluctuates between "good" behavior and "being a problem".
- (3)
- (2)
- (1) Seems like is almost always causing trouble in some way or another.

X. Affects

- (7) Usually happy and seems comfortable.
- (6)
- (5)
- (4) Moods will vary relatively equally between happy and unhappy and anxious.
- (3)
- (2)
- (1) Usually unhappy, anxious, seems like something's always bothering him (may also be seen in a child who's trying to act happy but is covering up.)

XI. Rate overall adjustment

- (7) As good as it could possibly be.
- (6)
- (5)
- (4) On a par with the average child.
- (3)
- (2)
- (1) As bad as one could imagine.

CHILDREN'S RATING SCALES

I. \_\_\_\_\_

II. \_\_\_\_\_

III. \_\_\_\_\_

IV. \_\_\_\_\_

V. \_\_\_\_\_

VI. a. \_\_\_\_\_

b. \_\_\_\_\_

c. \_\_\_\_\_

VII. a. \_\_\_\_\_

b. \_\_\_\_\_

c. \_\_\_\_\_

d. \_\_\_\_\_

VIII. \_\_\_\_\_

IX. \_\_\_\_\_

X. \_\_\_\_\_

XI. \_\_\_\_\_